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Worldwide Report

EPIDEMIOLOGY

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30 MARCH 1987

# WORLDWIDE REPORT

## EPIDEMIOLOGY

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BANK GRANT TO FIGHT POLIO IN LATIN AMERICA, CARIBBEAN

Kingston THE DAILY GLEANER in English 13 Feb 87 p 9

[Text]

THE Inter-American Development Bank has approved a US\$5.5 million technical co-operation grant to help carry out an action plan designed to eradicate the poliomyelitis virus in Latin America and the Caribbean.

The grant, which was extended through the Bank's Fund for Special Operations, will be used by the Pan American Health Organisation (PAHO) in co-operation with Ministries of Health of member states. Specifically, the funds will be used

to contract international and regional consultants, and to train national, regional and local officials in all aspects of the plan, a release said.

The short-term international consultants which will be contracted by PAHO include epidemiologists, virologists, laboratory technicians, foodchain specialists, health education experts and economists.

In addition, 11 full-time local consultants will be contracted in Bolivia, Brazil, Ecuador, El Salvador, Guatemala, Haiti, Honduras, Jamaica, Mexico, Paraguay and Peru to help the health ministries plan and implement the eradication programme.

The bank's resources will also be

used in the beneficiary countries to prepare and reproduce training manuals, organise workshops at various levels of the health care system and finance travel for organisers, monitors and participants.

The total cost of the polio eradication programme has been estimated at US\$47.6 million, of which the IDB's co-operation will cover US\$5.5 million. Other international development agencies are expected to contribute up to US\$36.6 million, with PAHO contributing the remaining US\$5.8 million.

The war against polio was one part of the Expanded Programme on Immunization (EPI), which was initiated in 1978 by the World Health Organisation. WHO's goal is to provide immunization services for diseases preventable by vaccination to every child in the world by 1990; and since the inception of the EPI programme, an estimated 15,000 health workers have been trained in Latin America.

Since the start of this initiative, remarkable progress has been made against the polio virus in the Americas, the release said.

/9274  
CSO; 5440/068

# BANGLADESH BELIEVED NOT FAR FROM AIDS SPREAD

Dhaka THE NEW NATION in English 23 Feb 87 pp 1, 8

[Excerpts]

How far is Bangladesh from the Acquired Immune Deficiency Syndrome (AIDS)—the deadly disease, the potential for which is worse than anything mankind has seen before?

Not very far, evidently. For, it has already reached India and other neighbouring countries like Thailand, China and Pakistan. According to a World Health Organisation (WHO) account of reported cases, the figures for the Asian countries read as follows: Japan-15, Thailand-6, Hong Kong-3, Turkey-2, Taiwan-1; China-1 and Israel-26.

Dermatologists in the country have been shocked into awakening by the discovery (and that, too, "purely by chance") of India's first AIDS carriers—six prostitutes, only a few weeks ago. While India is preparing itself in all possible ways for AIDS surveillance through a national media campaign and setting up of a large number of AIDS testing centres in collaboration with the WHO, Bangladesh is lagging far behind—little aware of the silent, deadly, prolific disease which may be lurking just around the corner.

## AIDS PHOBIA

Although the Bangladeshi dermatologists, epidemiologists and venereologists think that the country is still free from the deadly disease which has put so many people around the world at such great risk regardless of their age, sex, race or living standards, they are of the opinion that the recent increase in venereal disease cases may pave

the way for AIDS. It might already have reached the country but there is no way of telling in the absence of any surveillance system worth the name.

A large number of dermatologists and venereologists interviewed by The New Nation over the last couple of weeks, however, have pointed to the AIDS-phobia that is currently sweeping the country. An increasing large number of VD patients are turning up for AIDS check-up.

## BANGLADESH

Bangladesh is still handicapped by nonavailability of AIDS detection equipment, which are likely to be made available to the Institute of Post Graduate Medicine and Research (IPGMR) within a month's time through the auspices of the WHO.

Leading Bangladeshi experts think that it is time to call to arms, because, it is one such disease that 'once infected, a person is infected for the rest of his life'. Moreover, because of the long period when AIDS lies latent many may be infected and infectious without even knowing it.

It is also well known by concerned circles here that the WHO has called AIDS the most serious modern threat to public health, which is spread by sexual contact, shared hypodermic needles, blood transfusions and probably by mothers who breast feed their infants.

According to Prof. A. S. Mofrehuddin, a dermatologist and venereologist, consultant to Ibne Sina Laboratory, a certain

number of Bangladeshis staying outside and inside the country, have been suffering from AIDS-phobia because of their sexual contacts with a number of prostitutes. More than 70 per cent of the patients visiting him had VD.

Prof. Golam Moazzem, AIDS specialist in Bangladesh and Director of Ibne Sina Trust said that they had examined a number of 47,000 persons seeking overseas job and 2.15 per cent of them were found to be VD affected in the year 1981-86. It is to be noted that the persons with VD were mostly young aged between 21 and 35, he added.

Prof. Shamsul Azam, an eminent VD specialist, said that Bangladesh was still free from AIDS and there was nothing to be worried as yet. He, however, called for a media campaign and surveillance system immediately.

Octogenarian Prof. M. A. Baset, said that he was fully aware of the dangers but was yet to come across an AIDS case. He expressed deep concern over the rapid increase of VD among the young generation in the country and called for a system of sex education to avoid a catastrophic situation in future.

One of the venereologists said that about half of the prostitutes in the city have gonorrhea and more than one fourth suffered from other serious VDs. Gonorrhea is a more contagious disease than AIDS,

but because it is curable and its carriers are not infectious forever, one is not worried much about it, he added.

Most of the VD physicians said that persons visiting them were aged between 16 to 45 years, representing different income groups in the society.

A number of venercologists in the city, who have talked to The New Nation but do not wish to be identified 'right now' think that there must be some AIDS patients in the country and at least some AIDS carriers must have found their entry into the country in the absence of AIDS check-up arrangements inside the country. One of the doctors in the employmen of IPGMR thought that he had detected one AIDS case only to be laughed away by colleagues.

But the more serious among the experts think that AIDS is coming and we must prepare ourselves against it through: (a) educating people by means of a media campaign about sexual malpractices and their consequences; (b) setting up of AIDS check points at every airport and entry points along the borders; (c) putting an end to large scale viewing of blue films with iron conservatism, (d) increased surveillance against drug abuse and (e) launching a movement against pornography, polygamy, homosexuality, lesbianism and the like.

/13104

CSO: 5450/0100

## RESULTS OF SURVEY OF CHILDREN'S DISEASES TOLD

Dhaka THE NEW NATION in English 30 Jan 87 pp 1, 8

[Text]

Diarrhoea is still the major threat to children, particularly in the rural areas of Bangladesh, according to a survey carried out by the Palli Shishu Foundation, a voluntary child care organisation.

The disease pattern, as recorded with the Palli Shishu clinics, revealed that 20 per cent of the suffering children were attacked with diarrhoea. Foundation's executives who are also eminent child specialists told a news conference in Dhaka yesterday.

They said 15 per cent children suffered from common cold, 12 per cent from worm infestations, 10 per cent from skin diseases, 10 per cent from fever/like illness, 6.46 per cent from malnutrition, 6 per cent from anaemia, 4.5 per cent from bronchitis, 4 per cent from blindness 1.3, per cent from jaundice and 11 per cent from other diseases.

The Foundation executives said in order to further assess the situation arrangement was being made to record the change in the disease pattern and in the attitude of the public towards medical treatment, immunization, family planning, antenatal, natal and postnatal cares and

in the rate of morbidity and mortality.

Dr. Tofael Ahmed, an eminent child specialist said a total of 103 Palli Shishu clinics had so far been opened under 57 upazilas of the country with a view to providing medicare to the rural children. He said nearly 1 million patients received treatment at these clinics in last 5 years and 88 percent of these patients were the children of landless and marginal farmers.

He said, the Foundation had taken up a programme to impart training to 30 village dais (traditional birth attendants) and to 20 religious teachers on ante-natal, natal and post-natal care of child and mother and environmental sanitation, personal hygiene and nutrition and child-care in each clinic area, in the current year.

Dr. Total said to encourage the trainees to keep their interest alive in their works and to create awareness among the people about the necessity of their participation in the health-care campaign, prizes would be awarded twice a year to three best workers in each activity during the Palli Shishu Foundation weeks to be observed in the country.

/13104

CSO: 5450/0097

LEPROSY TREATMENT UNIT GIVES STATISTICS ON INCIDENCE

Dhaka THE NEW NATION in English 31 Jan 87 p 2

[Text]

DINAJPUR, Jan 29: At least one lakh people of four northern districts of Nilphamari, Panchagarh, Thakurgaon and Dinajpur have been suffering from leprosy, according to a competent source of mobile leprosy treatment unit. Besides, there are several thousands of undetected cases in the districts, it is also learnt.

The worst affected areas are Parbatipur, Chirirbandar, Birol and Sadar upazilas under Dinajpur district. Pirganj and Baliadangi upazilas under Thakurgaon district, Boda and Debiganj upazilas under Panchagarh district and Saidpur, Jalhdaka and Domar upazilas under Nilphamari district.

There is a leprosy hospital in Nilphamari with only 20 beds. At Parbatipur and Saidpur, two voluntary organisations are providing treatment to the local leprosy patients.

It is further learnt that few years ago, a plan was undertaken to establish a leprosy hospital at Saidpur. Buildings and quarters were constructed for the purpose but the hospital was not opened for unknown reasons.

The Government should take an immediate step to open the proposed hospital at Saidpur. Another three leprosy hospitals should be established in Panchagarh, Thakurgaon and Dinajpur district headquarters.

/13104  
CSO: 5450/0098



BRIEFS

CHICKENPOX, MALARIA OUTBREAK--Chicken-pox broke out in an epidemic form in different villages of Sarsa and Jhikargacha upazilas. Atleast 200 persons have been attacked with the disease. The disease lasts 7 to 10 days with severe pain and fever. In this situation a group of quacks are taking advantages. But the disease did not require treatment. Mosquito menance in Monirampus upazila town has increased an alarmingly causing great sufferings to the town dwellers. Adequate and effective measures have yet not been taken, it is alleged. Silted drains and stagnant waters scattered all over the upazila town are the breeding grounds of mosquito. At least 150 persons have been attacked with malaria. [Text] [Dhaka THE BANGLADESH OBSERVER in English 19 Feb 87 p 7] /13104

DOCTOR-PATIENT RATIO--There is only one doctor for every 7,500 people in Bangladesh, according to Health and Family Planning Minister Salauddin Kader Chowdhury. Giving this doctor people ratio in the Jatiya Sangsad (Parliament) yesterday during the question-answer hour, he said there were 7,348 physicians now working under the Ministry of Health. In reply to a question from Khandakar Mohammad Khurram (Sherpur-3), he said out of the government physicians, 2,937 were now working on adhoc basis. He said there were 145 Professors, 188 Associate Professors, 157 Assistant Professors and 4,648 Assistant Surgeons. Replying to another question from Principal Abul Kalam Majumdar of Awami League, the Health Minister said there were now 538 government hospitals under the Health Ministry with a total of 22,884 beds. In those hospitals, he said, there are now 437 vacant posts of doctors. [Text] [Dhaka THE BANGLADESH OBSERVER in English 13 Feb 87 p 1] /13104

CSO: 5450/0102

## AIDS STUDIES, TESTING, ATTITUDES DISCUSSED

### Vaccine Research

Ottawa THE OTTAWA CITIZEN in English 6 Feb 87 p A3

[Article by Anne McIlroy]

[Text]

At a high-security lab in Ottawa, a local researcher has joined with a world-renowned American AIDS expert to develop a vaccine for the killer virus.

One of Canada's leading virologists, Yong Kang, has begun collaborating with Dr. Robert Gallo, a co-discoverer of the AIDS virus at the National Cancer Institute near Washington.

Experts say Kang, a University of Ottawa scientist, has taken a different approach to finding a vaccine than hundreds of other AIDS researchers around the world.

Conventional vaccines involve taking molecules off the surface of a virus and using them to stimulate the body's immune system to produce antibodies — molecules that fight off disease.

Instead, Kang is working with an essential protein the virus needs to reproduce. Injecting that protein into humans would produce antibodies against it. Those antibodies would stop the virus from reproducing, he says.

If the virus can't reproduce, it will die out.

Through past work with vaccines, Kang has developed a way to genetically engineer cells from a cabbage-eating insect to produce lots of foreign proteins.

"We have the leading edge."

He's putting the insects to work at making his protein, so he can begin injecting it into rats to see if it works against AIDS.

It will be two years before his studies in rats are completed. Then work with chimpanzees will begin, and finally humans — if all goes well.

Gallo was too busy for an interview Thursday, but his spokesman confirmed he was collaborating with Kang.

The two have been working together since December, says Kang.

Gallo will be sending one of his graduate students to Ottawa to work with Kang.

The laboratory, at the health sciences building on Smyth Road, has the second-highest security level available. Workers in the lab must take special precautions, changing outer layers of clothing before they enter and leave.

In Canada, only a few researchers are involved in work on a treatment for AIDS, says Peter Gill, director of the bureau of microbiology at Health and Welfare's Laboratory Centre for Disease Control.

"This is very interesting."

Another leading virologist, Ray Marusik, from the University of Alberta, says Kang's work is exciting and adds to his well-deserved international reputation.

Kang is also using cells from his cabbage-eating bug to produce a more traditional vaccine for AIDS. This work is being carried out independently of Gallo.

World experts have predicted it will be at least five to seven years before anyone will have vaccine ready to use against AIDS.

Gallo is also collaborating with other teams around the world.

Kang is chairman of the department of microbiology and immunology at the University of Ottawa.

A graduate from McMaster University, he worked in the United States under 1975 Nobel prize winner Howard Temin before taking a position at the University of Texas.

Recent figures show there are 873 cases of AIDS in Canada. The disease is transmitted through blood and semen and attacks the body's ability to defend itself against disease.

High-risk groups have been defined as homosexual men, intravenous drug users who use dirty syringes and those receiving blood transfusions.

#### Immigrant Testing

Toronto THE TORONTO STAR in English 18 Feb 87 p A3

[Article by Joel Ruimy]

[Text]

OTTAWA — Canada quietly added AIDS more than a year ago to the list of diseases that can bar prospective immigrants from coming to this country, but Ottawa does not require applicants to undergo tests for the virus.

A health department spokesman said yesterday that acquired immune deficiency syndrome was added to the list, which includes leprosy, tuberculosis and syphilis, "in the fall of 1985."

Britain also added AIDS to its list recently.

Instead of tests, Canada relies on the medical records of an applicant compiled in the country of origin, which may or may not include the AIDS test.

The disease breaks down the body's immune defences and leaves the victim susceptible to a host of diseases.

AIDS may lie dormant for five years or more before becoming active. Ottawa estimates 50,000 people now have the virus in this country and that of these, as many as 35 per cent could develop active symptoms.

#### Tests too difficult

As of Monday, 898 cases of AIDS have been reported to the National AIDS Centre in Ottawa. Of these 471 have died.

One federal government physician said yesterday it would be too difficult to automatically screen all of the 115,000 immigrants Canada expects to take in this year.

"The tests are too sophisticated for some Third World countries to carry out and you can be tested today and show negative, and tested tomorrow and show positive."

Health Minister Jake Epp told a House of Commons committee earlier this month that Ottawa had no plans for mandatory AIDS testing of would-be immigrants.

But he did spell out the three conditions the health department applies to newcomers:

□ A person with a medical history showing they have the AIDS virus

but that it is dormant may qualify for a "conditional" admission;

□ Someone with AIDS-related complex, in which some symptoms of AIDS are present, cannot be admitted;

□ A person diagnosed as having the active disease also cannot be admitted.

### Hospital Staff Attitudes

Toronto THE GLOBE AND MAIL in English 14 Feb 87 pp A1, A3

[Article by Dorothy Lipovenko]

[Text]

In the three years that James St. James has been in and out of a Toronto hospital with AIDS, he has had more than his illness to cope with. One nurse wore "as much gauze and crepe as you can find" to take his temperature, and a member of the house-keeping staff at St. Michael's Hospital refused to clean his room.

"They have a right to be frightened," said the 32-year-old Toronto actor, describing staff reaction to a patient with acquired immune deficiency syndrome.

"When the cleaner refused to do my room, I ripped the phone out and threw it in the hall and said, 'Excuse me for making a scene but I wanted to get your attention.'"

Attention he got. The administration subsequently offered employees seminars on AIDS. "They wanted to know what helped me emotionally, what would make me more comfortable," Mr. St. James recalled.

The reaction to his outburst is not unusual. As more and more AIDS patients are admitted for treatment, and ultimately to die, Canadian hospitals are faced with staff members who are fearful or ignorant of the syndrome, who harbor prejudices against homosexuals (the most discernible group of patients) or who resist handling the patients.

Employees at several Ontario hospitals have been told they cannot refuse to work with an AIDS patient, except under limited circumstances. (Pregnant nurses can be reassigned if they wish.)

As staff at all levels — from the janitor to the chief of surgery — confront the problem of dealing with AIDS, hospitals are giving

seminars to reassure workers and their families and ensure compliance with hygiene precautions.

"We had to deal with new information and a new set of emotions," said Dr. Martin Inwood, chief of hematology-oncology at St. Joseph's in London, Ont. AIDS has caused hospitals to change their work patterns. At Toronto's Wellesley Hospital, operations on AIDS patients are booked for the end of the day, to give cleaners adequate time to disinfect the room overnight. At the Royal Victoria in Montreal, nurses with a cold are reassigned to other patients to protect the fragile immune system of the AIDS patient. In Vancouver, St. Paul's gives AIDS patients single rooms for privacy and to avoid upsetting other patients.

Several hospitals, including St. Joseph's, have set up multi-disciplinary committees to review policies and procedures on AIDS. Some have translated information on AIDS into Portuguese and Italian for housekeeping staff. Certain disciplines, including infectious control and nursing, hold regular seminars to synchronize their roles.

Physicians, health-care workers and homosexual men with AIDS agree that hospitals have matured in their approach.

"We've come a long way from the space-suit approach, when staff would double mask, double glove, double gown, just to go into a patient's room," says Dr. Iain Mackie, co-director of the intensive care unit at St. Joseph's.

Initially, transmission was the most common concern. Staff members feared they would catch the virus if an AIDS patient so much as breathed on them; nurses wondered if they could pass it on to their children at home. AIDS patients had to eat with plastic cutlery on disposable dishes, until hospitals learned it was safe to use regular utensils.

As more information about AIDS became known, precautions were relaxed.

AIDS patients are not isolated. As with any other patient who has an infectious, blood-borne disease (such as hepatitis), a sign is posted on their door to alert staff to take precautions handling blood and fluids.

Dr. Mackie says some of the paranoia is linked to homophobia, which is more acute in smaller communities like London. "We had to prove to surgeons they weren't going to die from AIDS by operating on a patient. There was a great deal of reluctance initially to operate on AIDS patients."

Not only doctors feel threatened by treating gay men. Brent Neumann, an Anglican pastoral care worker at St. Joseph's, said he was "torn between feelings of compassion toward these people and a bias and prejudice of my own (heterosexual) lifestyle. It created a great deal of conflict within myself."

But, for all the steps taken, "there's still a lot of education that needs to be done," said Dr. Jack Fowler, a Toronto physician with a large practice among homosexual men. "There's not enough education to combat the gay-bashing mentality of some medical people."

That attitude affects patient care, he said. "Meals are dropped outside the door. (Housekeeping) refuses to go into the room. . . . The feedback I get from patients is of unfeeling, uncaring nurses. I've had patients who literally have not seen a nurse for an entire day."

"They feel like lepers and many times they are handled by people dressed like Martians — and that's not to dress a wound but to take a (food) tray into the room. . . . But I will say things are changing, very

painfully and slowly."

Simone Wartman, an infection control nurse at Wellesley Hospital, located in the heart of Toronto's gay community, says "there's still a bit of a problem getting across to nurses . . . there are still some people who tend to be somewhat paranoid."

Even though people with AIDS have been walking in the door at Wellesley for five years, the hospital decided more education was necessary to allay employee concerns. Last fall, it sponsored a program covering topics such as isolation procedures and social issues related to AIDS.

"I think at the beginning, there was (among some employees) a very anti-gay attitude . . . that 'Tough, it's their problem, let them die,'" Mrs. Wartman said. "We really stress that regardless of sexual behavior, they are human beings. I think there has been a change in attitude."

Irene Corbett, head nurse on the ward where most AIDS patients are admitted at the Royal Victoria in Montreal, says older nurses who worked during the polio scare of the fifties handle AIDS better than some of the younger nurses.

She said the nursing staff has changed some routines to be more flexible with AIDS patients, who may be too sick to eat when a meal is served or who need to get out of the boxed-in atmosphere of their room.

In addition to bedside care, many nurses have found themselves running interference between an AIDS patient and his family. Some are faced with distraught parents who are unaware their son is homosexual, much less suffering from AIDS.

"Unless we get permission from that patient to tell his parents what's wrong, we can't," Mrs. Corbett said. "You try and work it out with the family. But we're in between."

"For many patients, we become their family . . . It's very hard to send someone home (in the last stage of their illness) knowing you probably won't see them again."

## Study of Hemophiliacs

Toronto THE GLOBE AND MAIL in English 18 Feb 87 p A8

[Article by Dorothy Lipovenko]

[Text]

About 90 per cent of 200 severe hemophiliacs in Canada show exposure to the AIDS virus, according to results emerging from a national study on the risk of the syndrome in hemophiliacs.

The hemophiliacs who tested positive for the acquired immune deficiency syndrome antibody had been exposed to blood products before 1985, when health officials started to require heat-treatment of donated blood to kill the AIDS virus.

Hemophiliacs, especially those requiring multiple transfusions, are being monitored in the study to see what happens to their immune systems. AIDS can take several years to incubate and hemophiliacs who received blood from infected donors before screening procedures went into effect are at risk.

Hemophiliacs are missing an essential component to help blood to clot. This ingredient is derived from blood pooled from 1,000 to 5,000 donors.

"We're very concerned about anybody who got blood products before we could test for evidence of exposure (in the donor blood)," said Dr. John Derrick of the Canadian Red Cross.

But Dr. Derrick cautions that it is too early to tell whether hemophiliacs who test positive for the AIDS antibody will go on to develop the syndrome.

According to the most recent data from Ottawa's Laboratory Centre for Disease Control, seven of the 13 hemophiliacs reported with AIDS have died.

The study by Montreal immunologist Dr. Christopher Tsoukas also found that 85 per cent of another 170 hemophiliacs who had received heat-treated blood showed no signs of exposure to AIDS.

Dr. Tsoukas said most of the AIDS-related contamination Canadian hemophiliacs have been exposed to is from U.S. donors, because the United States is a major world supplier of blood concentrates for hemophiliacs.

His study is being financed by the

Medical Research Council and all 10 provinces have enrolled hemophiliacs in the project.

According to Dr. Irwin Walker, chairman of the medical advisory committee to the Ontario chapter of the Canadian Hemophilia Society, about half of Canada's hemophiliacs have been exposed to the AIDS virus. The ratio is 60 per cent for severe hemophiliacs and about 30 per cent among mild or moderate hemophiliacs.

Dr. Walker said that drawing attention to the situation has repercussions.

"People will get fingered at work, children will be chased out of school," he said yesterday.

But the small number of hemophiliacs who have developed AIDS is "a cause for optimism," said Dr. Walker, a hematologist at Chedoke-McMaster Medical Centre in Hamilton. "Whether it's realistic or not remains to be seen."

He said some hemophiliacs who have tested positive for the AIDS antibody have enlarged glands, suggesting there is a pool of people in whom the AIDS virus is somewhat active.

Dr. Tsoukas said the impact of the AIDS situation on hemophiliacs and their families is "devastating. The grief these people go through is incredible."

Physicians and the Canadian Hemophilia Society have been counselling hemophiliacs about safe sex practices (use of condoms), to protect their wives. (AIDS is transmitted through exchange of bodily fluids, primarily sexual contact.)

Dr. Tsoukas said none of the 70 family members also being tested in the study has shown exposure to the AIDS virus. But two of the hemophiliacs in the study have gone on to develop the syndrome.

Robert Shearer, director of national programs for the Canadian Hemophilia Society, said yesterday that hemophiliacs are being urged to delay having children until more is known about AIDS. "It's putting a strain on some marriages," he said.

## Study of Prostitutes

Toronto THE GLOBE AND MAIL in English 12 Feb 87 p A4

[Text]

### OTTAWA

None of the 109 prostitutes from Vancouver, Edmonton and Calgary who participated in a federally sponsored study on AIDS two years ago had been exposed to the virus that causes the deadly syndrome. The study, the only one of its kind ever done in Canada, was started in January, 1985. Results were published in the latest issue of the Canada Diseases Weekly Report of Health and Welfare Canada. Researchers had expected to find 3 per cent of the prostitutes with antibodies to the AIDS virus in their blood. However, they discovered that 96 of the 109 women had their clients wear condoms, and only seven of the women had rectal intercourse with clients.

### Quebec Blood Donors

Toronto THE TORONTO STAR in English 19 Feb 87 p A2

[Text]

MONTREAL (CP) — New statistics show that an abnormally high number of blood donors in Quebec have AIDS antibodies in their blood, Red Cross officials say.

An analysis of blood donated to the society since November, 1985, indicates that there are four times more blood donors in Quebec with traces of the AIDS antibodies than there are in Ontario.

"It's worrying us a lot," said Francine Descary, medical director of the Montreal Red Cross. "We're trying to determine why."

Acquired immune deficiency syndrome destroys the body's immune system, leaving it vulnerable to deadly infections.

A person can test positive for the AIDS antibodies without having the disease. It is not known how many carriers of the antibodies go on to contract the deadly disease.

Descary said two possibilities for the figures are being considered. Either high-risk people are giving blood as a way of being tested for the AIDS antibodies, or there are effectively more carriers of the AIDS virus in Quebec than elsewhere.

The Red Cross figures indicate that in Quebec, 45 out of every 100,000 donors test positive for the antibodies. That compares with 13 out of every 100,000 in Ontario and 18 per 100,000 in Canada generally.

"We're very worried that people may be using the Red Cross to find out if they have the antibodies," Descary said. "If that is the case, we absolutely have to launch a campaign to get them to have their blood analyzed elsewhere."

The antibodies can go undetected because it takes at least six weeks for them to develop after contact with the AIDS virus.



The Red Cross will soon be distributing a new pamphlet urging that groups at risk, especially homosexuals and drug addicts, refrain from giving blood.

In Vancouver, meanwhile, the number of AIDS tests performed by the provincial government laboratory has doubled since Jan. 1. And the provincial AIDS clinic is so busy with demands for tests that it cannot take new patients for a month.

The reason for the increase is "more media awareness and more emphasis on heterosexuals," said Dr. Michael Rekart, director of venereal disease control for the British Columbia health ministry.

#### CBC Messages

Toronto THE GLOBE AND MAIL in English 20 Feb 87 p A4

[Text]

The CBC has changed its policy on condom advertising to permit messages about the prevention of AIDS, but it will continue to exclude manufacturers' ads for specific brands.

In a statement released yesterday, the Crown corporation said messages mentioning condoms must be balanced with information about "self-restraint" as another means of reducing the risk of contracting acquired immune deficiency syndrome.

The CBC had refused to carry messages about condoms, saying that these might appear to give tacit approval of casual sex.

But with AIDS spreading and no cure available, the corporation decided to accept messages "that are responsible, in good taste and factually balanced."

Richard Chambers, a CBC spokesman, said the public health messages "are not advertisements for condoms — what we are talking about here are messages that inform and educate the public about the dangers and control of AIDS."

Private broadcasters have said they will accept both informational and specific commercial advertisements for condoms, although a spokesman said early yesterday that they wanted guidelines from the federal Health Department.

However, Gerald MacDonald, chief of regulatory processes for the department, said the only restriction would be "that the content of messages must not be false and misleading. We would not object to an ad

which says a condom helps prevent AIDS. We would frown on one that says a condom is 100 per cent effective."

Mr. MacDonald said health officials, who must approve ads for medical devices before they are broadcast, "really don't expect to have difficulty with these ads because we expect they will be accurate."

The first ads about AIDS that include mention of condoms will probably appear in March as part of a five-year, \$3.7-million campaign by the Canadian Public Health Association.

Under contract from the Health Department, the association is preparing broadcast and print messages to complement a range of information programs about AIDS, the fatal syndrome usually transmitted through intimate sexual contact.

Robert Burr, director of communications for the association, welcomed the move by the CBC despite its careful boundaries of acceptability.

"We are of course going to have to fit our ads within those guidelines," Mr. Burr said. "But we're hopeful that ours will be approved and we're certainly pleased that they've taken the step to at least speak positively toward reception of them."

No private manufacturer has yet offered an ad for clearance, but Jean Sattar, a Health Department spokeswoman, said informal discussions have been held to discuss what would be expected.



## Vancouver Condom Sales

Toronto THE GLOBE AND MAIL in English 18 Feb 87 p A8

[Article by John Cruickshank]

[Text]

### VANCOUVER

A convenience store chain plans to stock condoms among its health products because of growing concern about the spread of AIDS.

The 7-Eleven chain will sell condoms on an experimental basis at about 50 of its stores in the Vancouver area.

Company spokesman Terry Cashin said the chain had decided to put condoms on the shelves to make them more accessible to customers who might be too embarrassed to ask a clerk for them.

Mr. Cashin said the company had concluded that it could help in reducing the threat of acquired immune deficiency syndrome by making the contraceptives more available.

He acknowledged that some customers might object to condoms in the store, but said he is unconvinced by those who argue that making condoms more accessible will increase promiscuity among young people.

Some 7-Eleven stores in the United States already stock condoms. But it is believed that this is the first time a convenience store chain in Canada has taken such a step.

Russ Egerdie, vice-president of Mac's Milk stores, said in a telephone interview from Toronto that his chain will begin selling condoms in a few days in stores throughout Greater Vancouver and the lower Fraser Valley.

Frank Farr, general manager of Southland Canada, owner of the 7-Eleven chain, said the company had decided to act on the recommenda-

tion of health authorities.

"We felt that with the preponderance of evidence pointing to the fact that the use of condoms reduces the risk of spreading this deadly disease, the time was right for its introduction through our retail outlets.

"We obviously reach the market that the medical authorities and experts want addressed. We do have a lot of young people using our stores who might not otherwise feel comfortable or confident enough to obtain this product in the more traditional outlets."

The availability of condoms and education of teen-agers about AIDS have become issues of heated debate in B.C.

Premier William Vander Zalm has said that the discussion of condoms and safe sex in schools will increase teen-age promiscuity.

But Vancouver's chief health officer, Dr. John Blatherwick, has repeatedly called for wide public education because of the threat AIDS poses and the effectiveness of condoms in reducing the dangers of infection.

The increase in AIDS infection is higher in B.C. than anywhere else in Canada. There were 100 new cases of AIDS diagnosed in 1986 and another 200 are expected this year.

The British Columbia Medical Association became this month the first organization of its kind to take out a newspaper advertisement to alert British Columbians to the dangers of AIDS.

/9317

CSO: 5420/15

BRIEFS

ALUMINUM WORKERS' BLADDER CANCER--Vancouver--Six people who worked in the pot room at Alcan's aluminum smelter in Kitimat, B.C. have filed claims with the provincial Workers' Compensation Board because they have bladder cancer. Ross Slezak, president of Local 1 of the Canadian Association of Smelter and Allied Workers, said as many as 24 other pot room workers may have bladder cancer. Allan Hewitson, Alcan's public relations manager, said Alcan has known for several years that aluminum workers appeared unduly susceptible to some diseases, including bladder cancer. [Text] [Toronto THE GLOBE AND MAIL in English 2 Mar 87 p A5] /9317

CSO: 5420/18

EXPERT: AIDS BEGINNING TO SPREAD THROUGHOUT GENERAL POPULACE

Helsinki UUSI SUOMI in Finnish 30 Dec 86 p 7

[Text] Nearly a fifth of those suffering from AIDS in Finland do not belong to the so-called high-risk groups. All told, three Finns have contracted the disease from partners of the other sex.

"The spread of AIDS to the general populace began last summer and, if it spreads from the high-risk groups to others, it will be very hard to control the disease," Medical Board chief physician Olli Haikala said.

The Medical Board is now trying to keep AIDS and the HIV virus that causes it from spreading to young people through a campaign aimed at them. As soon as January, all 18-to-21-year-old Finns will be getting a leaflet telling them about venereal diseases and a condom sent to their homes.

"They ought to write in red on the condom that it may save their lives," said Dr Sirkka-Liisa Valle, a specialist in diseases of the skin and venereal diseases.

Condoms are not an absolutely certain way of preventing the disease either. They can rupture. One person in Finland contracted the HIV disease during a single occurrence of sexual intercourse when his condom ruptured right in the middle of it.

"Now we are talking about a disease affecting all humans, not about a disease affecting [only] homosexuals," Haikala emphasized.

The spread of the disease to the general heterosexual population is more common in Finland than it generally is in Europe and the United States where from 3 to 4 percent of AIDS patients have gotten the disease from those of the other sex who have it. The corresponding figure in Finland is 17 percent. Furthermore, we have one hemophiliac who got AIDS from transfusion blood.

11 of 17 AIDS Patients Have Already Died

About 140 people infected with HIV have been discovered, but 17 of them have contracted AIDS. A total of 11 people have died of this disease here in Finland.

No one can exactly predict future figures. One speaks of 100,000 Finns infected with AIDS by the year 2000 while another speaks of hundreds or at most 1,000.

But if the disease advances at the same rate it has up to now, that is, if the number of those suffering from it doubles every year, by the end of the millenium one Finn out of every two would be infected and over 275,000 Finns would be suffering from AIDS itself.

"I don't think that that's the way it will be with the disease. There are so many variables that we cannot predict what will really happen," chief physician Jorma Tikkanen of the Medical Board said.

#### New Sources of Infection

Up to now the only way to become infected was felt to be through blood contact. But now experts on the subject are beginning to believe that people are being infected through saliva or open skin sores.

"It has not been demonstrated that HIV may be contracted through food, drink or the air. HIV is not like an influenza virus, which spreads as an airborne particle infection. But as the incidence of the disease increases, we must gradually consider other ways it may spread as well," Valle said.

#### Kissing

"An elderly married man was infected with HIV through transfusion blood and later his wife was also infected. In the course of a detailed investigation it became apparent that the virus could not have been contracted other than through saliva when kissing. But to become infected with the virus through kissing long-term contact with the same partner is apparently necessary."

#### By Biting Too

Another suspicion that [the disease] may be transmitted through saliva is in connection with a little boy's quarrel with his brother. The infected boy bit his healthy brother and the latter contracted the disease later.

Valle stressed the fact that these are individual cases and that in the majority of cases (as much as 80 percent of them) people are still infected through sexual contacts.

"But the more we learn about HIV, the more cautious we are about saying that it is contracted in this way or that way," Valle remarked.

#### Mother Gets It from Her Child

People have also been infected with the disease through contacts incurred in caring for others. A mother handled the blood of her child who had gotten the disease--and she contracted HIV. Another woman was taking care of her neighbor, who was ill with AIDS, with open sores on her hand--and she was infected.

"At the present time there is no proof that AIDS can be contracted in everyday activities. But we in Finland nevertheless need stricter controls; we ought to find those people who have been infected.

"I'm certain that, when the first Finnish nurse is infected with HIV through a needle scratch, calling for job safety, we here will demand public tests," Valle said. Throughout the world about 10 nurses have already been discovered who were infected with HIV in connection with caring for others.

In Valle's opinion, the steps Finland has taken to combat the spread of AIDS have been remarkably sluggish, although recently they have clearly been getting more active as concerns this on the Medical Board.

#### Valle's Theses

A lot of information for people, but we cannot rely on this alone.

Carriers of the infection must be found through screening tests to verify the present situation.

Make the law stricter, [declare] AIDS to be a disease that is a public danger and stipulate that knowingly infecting someone with it is a crime.

Those who have been infected with it must be guaranteed any medical, psychological and social assistance they need.

11,466

CSO: 5400/2425

IMMUNIZATION DRIVE EXPECTED TO PREVENT CSM EPIDEMIC

Accra PEOPLE'S DAILY GRAPHIC in English 3 Feb 87 p 8

[Article by George Sydney Abugri ]

[Text]

**THE Ministry of Health in the Upper West Region has said that in view of last year's intensified mass immunization programme, it does not expect any outbreak of the disease Cerebro Spinal Meningitis (CSM) to reach epidemic levels this year.**

Briefing the "Graphic" at Wa on reports of outbreak of the disease in some parts of the region, Dr. G. D. Bainge, Regional Director of Health Services said that under last year's Expanded Programme on Immunization (EPI) about 70 per cent of the region's population of more than 400,000 were effectively immunized against the disease.

He said immunity acquired from an initial dose lasts two years and booster doses will be administered at intervals of five years to ensure continued immunity against the killer disease.

Fifty-one cases of CSM, Mr Bainge said had been reported in the region between December last year and late January this year, with six deaths among the most fatal cases.

Dr Bainge said four health teams have been dispatched to towns and villages on the region's border with neighbouring Burkina Faso, to monitor the spread of the disease in the border towns and villages where reports of sporadic outbreaks have been indicated.

Most of the sporadic outbreaks, he said, occurred in the Nandom and Hamile areas of the region which are close to the border.

Meanwhile two immunization teams made up of staff of the Medical Field Unit (MFU) and the Medical Officer of Health (MOH) have also been dispatched to the Navrongo and Sandema districts in the Upper East Region to treat people who have been attacked in some villages within the two districts, reports Iddrisu Seini.

Two persons out of five reported cases died at Gbedembilisi in the Sandema District while three out of 12 cases reported at the Navrongo War Memorial Hospital died last month.

Dr. William H. Gandaa, Upper East Regional Director of Health Services who described the reported cases as sporadic during an interview, said the two teams will check the disease from affecting other people at Ballansa and Gbedembilisi in the Sandema District as well as other nearby villages in the Navrongo District.

## BRIEFS

MEDICAL TEAM DISPATCHED TO MINTAHKROM--A team of medical personnel, has been despatched from Akuapem Mampong Tetteh Quarshie Memorial Hospital to Mintahkrom, near Adukrom to help control an outbreak of an epidemic. Diseases so far diagnosed included schistosomiasis (bilharzia), strongyloides, ancylostomiasis and intestinal flagelates. The outbreak which has affected almost the entire population has been attributed to the village's only source of water, a small brown-water pond. Over 300 victims have already been treated. Addressing the people later, Mr M. A. Fening, Akuapem District Health Superintendent advised them to boil all water before using and also asked them to avoid wading and swimming in the pond. Meanwhile, the people have appealed to the government to assist them construct, as a matter of urgency, a bore-hole to replace the pond. A spokesman for the village declared that, they would contribute to supplement the government's effort and also assist through communal labour. [Text] [Accra PEOPLE'S DAILY GRAPHIC in English 31 Jan 87 p 8] [Article by Ernest Asare-Buakyi] /13104

GUINEA WORM INFESTATION AT NYANKOMASI--The people of Fanti Nyankomasi and surrounding areas have appealed to the health authorities to help them control an acute guinea-worm infestation that has affected the area. According to a statement issued by the queenmother of the area, Nana Adwoa Aniwa about 85 per cent of the inhabitants are affected by the disease. She explained that, the disease has become prevalent due to the unhygienic nature of the source of their drinking water. She said that though there are pipes in the town, they do not function due to the defect of the pumping machine. The queenmother has therefore promised to cater for any volunteer medical team that will offer to help them. [Text] [Accra PEOPLE'S DAILY GRAPHIC in English 23 Jan 87 p 8] /13104

CSO: 5400/118

HUNGARY: CEMA COORDINATOR OF MALARIA RESEARCH

Budapest HUNGARIAN DIGEST in English No 1, 87 pp 28-30

[Article by Istvan Palugyai]

[Text] Recently one has heard more and more about the spread of various tropical diseases and the difficulties encountered when medicine tries to combat them.

Must mankind again succumb to attacks by the dangerous bacteria thought to have been conquered earlier in this century?

The person we asked about this is Professor Ference Varnai, perhaps the best known specialist Hungary has on the subject.

The professor is general director of Budapest's Laszlo Hospital.

F.V.: In the past twenty or thirty years, thanks to vaccines and antibiotics, contagious diseases have been displaced from their earlier position as the chief cause of mortality. They now occupy fourth place in the statistics after cardiovascular ailments, cancer and traffic accidents. This fact is, of course, true only for the developed countries, since even today contagious diseases are the main cause of death in the countries of the Third World. These make up the largest part of our Earth, and the people living there constitute 75% of the global population. In addition, demographic trends indicate that by the year 2000 the populations of these countries will rise by half as much again. It has been estimated that 94% of expenditure on food supply occurs in the developed countries while the undernourished people of the world

have only 6% at their disposal. As we know, undernourishment creates conditions in which pathogens can cause disease.

*Nevertheless, the incidence of infections once thought to have been conquered is on the increase in the industrially advanced countries.*

No doubt one of the reasons for this is the development of north-south relations and north-south tourism. Each year some six to seven million people from Europe travel to the tropics and many of them become carriers of communicable diseases. Thousands of people travel south from Hungary each year and 20% have one disease or another when they return. This is how diseases like malaria, bilharsiasis and leishmaniasis appeared in Hungary. These are serious illnesses.



Aggravating the situation is the number of people coming from the tropics for a stay in Hungary who are carriers of some communicable disease.

*What about diseases that are new?*

There are quite a number of new diseases in the world. They include a fever involving hemorrhages, or Lyme Disease, discovered in Old Lyme City. This is spread by ticks and attacks the central nervous system. The list must also include AIDS, which is also probably of tropical origin.

*You head the department of tropical diseases at Budapest Medical School. How do you teach doctors this subject?*

Tropical diseases have been taught at the university for years now. Every fifth-year medical student must pass an exam on the material taught at the tropical disease department and this is complemented by hospital practice. In addition, we organize regular in-service training for internists and also for pediatricians. We are also the ones who train doctors who undertake work in the tropics along with briefing other people going to work in the tropics.

*At your hospital there is scientific and health organization work being done alongside therapy...*

We have been assigned special tasks by the Ministry of Health and we handle certain issues within the framework of the CMEA. For instance, as a member of the commission of experts on the tropics, I am chief coordinator of malaria research. This past September a conference was held in Hungary to evaluate the work done by the

CMEA commission during the last five-year plan period. Vietnam is the country most heavily hit by malaria, but this disease is also regularly brought into the European states. For instance, there are 25 to 30 new cases of malaria annually in Hungary.

Commissioned by the World Health Organization, we are also doing research work in three fields. In addition to synthesizing and doing toxicological and effects testing on new anti-malaria agents, we also have the job of conducting research into and treating special drug-resistant malaria. The other WHO commission we have is to administer control checks on people who have taken medicines to prevent malaria. We are making a comprehensive survey of the malaria situation in Europe.

*In the past few years researchers all over the world have enjoyed notable results in their fight against contagious diseases. Most recently, for instance, they have managed to develop a vaccine effective against virus B causing contagious hepatitis. What's the situation in Hungary regarding this long-awaited breakthrough?*

We first received this vaccine a year and a half ago and have had no case where any person inoculated with it has contracted the disease. The research data on this vaccine that has been published is quite encouraging but for the moment our limited financial opportunities enable us to only inoculate staffs at kidney dialysis stations, and in clinical and microbiological laboratories. The HEVAC-B vaccine purchased from the Pasteur Institute in Paris is therefore available to only a limited number of people.

## FINDINGS OF MEDICAL TEAM ON POLIO-AFFECTED CHILDREN

Madras THE HINDU in English 29 Jan 87 p 3

[Text]

VIRUDHUNAGAR, Jan. 28.

A report that 35 children of Avudayapuram village in Kamarajar district had been affected by polio and lameness for a long time was referred to the Department of Orthopaedics, Madurai Medical College, by the Kamarajar District Collector, Mr. L. N. Vijayaraghavan, for investigation.

A medical team, consisting of Dr. A. Subramanian, Professor and Head of the Department of Orthopaedics and other surgeons and orthopaedic technicians, visited the village and examined the affected children.

The medical team found that 20 children had been affected by polio of whom four suffered the disability consequent to an attack of brain fever. A random examination of eight children of the village found them to be in normal health with no neurological impairment.

The team concluded that the paralytic lesions were not due to water toxicity but were attributable to poliomyelitis, effects of brain fever or congenital brain damage. Again the affected children have shown improvement over the course of time whereas their condition would have worsened in case of water toxicity.

Other reasons for the prevalence of the diseases could be the high incidence of consanguineous marriages in the area and vitamin deficiency.

The team has suggested surgery for eight cases, calipers for seven cases and drugs for

the other patients. The children will undergo surgery at the Government Rajaji Hospital in Madurai shortly. Calipers will be provided soon to the seven children free of cost by the Collector of Kamarajar District.

Though water toxicity is not a cause for these diseases, the Collector is taking steps to provide piped potable water to the villagers.—Our Staff Reporter

/9274

CSO; 5450/0089

## CHILDREN'S MEASLES DEATHS DUE TO SUPERSTITION

Bombay THE TIMES OF INDIA in English 8 Jan 87 p 6

[Article by Ysuf Khan]

[Text] Superstition has resulted in the death of 53 children due to measles in Khodiyarhagar, a slum area of the city, near the Pirana sewage treatment plant of the city municipal corporation, during the last one month.

The first death due to measles in this hutment colony was reported on December 12 last. Since then, every day two to three deaths takes place in this predominantly labourers' colony housing nearly 4,000 huts. The majority of the population is engaged in pulling carts to transport goods in the city.

Today itself three deaths have taken place in this locality due to measles. The main reason for not taking the children to hospital for treatment of measles is that the people of the area who belong to the "Vadhiyara" community of Banaskantha district do not want to displease the god of measles "baliya bapa" and their community deity "chamunda".

So intense is their belief in the supersitition of not displeasing the god of measles that the deaths are not at all mourned. In fact, the death of a child in the family due to measles is celebrated with distribution of sweets among the other members of the community. Even the mother of the dead child is not allowed to weep over the loss of her kid.

When this reporter visited the locality today, Raju Arian, the six-year-old child of a widow, had died. Nearly 20 members of the Vadhiyara community had gathered at his small hut. All those who had come to the house were being served tea. The uncle of the dead child, Ramji Viramji Solanki informed that Raju died in the early hours of today. In fact, this was the second death in the family. His own child, Ramesh, aged five, died on Saturday last.

Ramji Solanki said it was a "sin to take a child affected by measles to hospital because traditionally, they would prefer to allow the child to die at the altar of their deity than displease the goddess." He said that both the children were taken to the hospital only after eight days when the measles "subsides." But by then, the chances of survival are bleak.

Ramji Solanki said that both the children of the family died as they were taken late to the hospital. He admitted that it was a crime to allow a child

to die for lack of treatment but he did not have the guts to defy the elders of the community who were opposed to the treatment of diseases like measles, chicken pox and small pox.

According to Dr P, S, Panchal, medical officer of the infectious diseases hospital, nearly 46 children from Khodiyarnagar in the age group of one to six years were admitted on Sunday last,

Thirteen of them were treated in the out-patient department and discharged immediately. Twenty-two of them have been admitted as indoor patients. The condition of all of them was improving fast. Even four children, who were serious, were recovering satisfactorily.

The death of children in the area was brought to the notice of the municipal authorities only on Sunday last when they set up a medical centre and started giving anti-measles vaccination to the children,

The chairman of the health committee of the city municipal corporation, Mr Govindbhai Solanki, and the deputy mayor, Mr Sirajuddin Kazi, who represent this area in the city municipal corporation, virtually forced the residents to take their children to the infectious diseases hospital in a civic ambulance van which was pressed into service.

In the infectious diseases hospital, a separate ward has been started for the children affected by measles. However, Dr Panchal says a number of parents had taken away their children from the hospital, without completing the treatment. This, he said could result in more deaths in the coming days.

/9274

CSO: 5450/0084

## PLANS TO DEPORT SWISS AIDS SUSPECT TOLD

Bombay THE TIMES OF INDIA in English 3 Feb 87 p 3

[Text] Bombay, 2 Feb--A Swiss drug addict who was admitted to Tilak Hospital, Sion, on January 15, after being picked up unconscious from Juhu beach here, is scheduled to be deported early tomorrow, after doctors suspected AIDS.

A blood test carried out on the drug addict, Pascal, 25, was found to have "high titre", indicating that he had either come in contact with the dreaded disease or actually contracted it. Also, his lymphocyte (a component of white blood corpuscles which helps fight infections) count was found to be marginally below normal, it was reliably learnt today.

The report of the blood test, done at K.E.M. Hospital's AIDS clinic, has not yet been officially communicated to the doctors at Tilak Hospital. But a houseman treating Pascal was told about the "high titre" condition yesterday.

Another blood sample was drawn today, few hours prior to his discharge from the hospital at 3 p.m., and sent to the laboratory for confirmation of the initial finding.

Pascal was found unconscious, from where he was transferred to Tilak Hospital's intensive care unit. His case was diagnosed as a "pneumonic patch in the lungs", leading to "pyo-pericardium" (puss around the heart membrane).

Doctors said he spoke only French and had told them that he hailed from Switzerland. The deputy consul-general of the Swiss consulate in the city got in touch with the hospital on January 28, when doctors were informed that their patient had overstayed in the city and hence would be deported.

Meanwhile, Pascal was shifted to the cardiology ward, from where he was transferred to medical ward number 16 on January 21. He had shown an improvement in his condition and a tube had been inserted into him to drain the puss from the pericardium.

Following the discovery that Pascal was addicted to narcotics, doctors decided to perform a test for AIDS. A blood sample was sent to K.E.M. Hospital, the results of which were unofficially communicated yesterday.

/9274

CSO: 5450/0091

## INDIGENOUS VACCINE AGAINST JAPANESE ENCEPHALITIS

Bombay THE TIMES OF INDIA in English 9 Feb 87 p 5

[Text] BOMBAY, Feb. 8 (PTI).

**T**HE National Institute of Virology (NIV) at Pune has successfully developed a vaccine against the deadly Japanese Encephalitis (JE) virus, infection of which inactivates the human brain and leads to death of the victim within two to four days of contacting the virus.

The vaccine produced under a new technology, indigenously developed by the NIV scientists using Indian JE virus strain, has been tested on animals and found to be totally effective.

This technology employs the chick embryo culture (tissue culture), unlike in the case of formalised mouse-brain (inactivated) vaccine developed by Japanese scientists, which is the only vaccine against JE so far available in the world.

The tissue culture technology enables mass production of vaccines at a comparatively economical rate.

**MORE EFFICIENT**

Besides the cost-effectiveness, the new vaccine is purer and more efficient, claimed Dr. (Miss) Khorshed Pavri, director of NIV.

"Its development constitutes a major breakthrough in the research of JE virus," Dr. Pavri said.

The Central Research Institute (CRI), Kasauli, has adopted the Japanese method and after some years of research, is now ready to release

about two million doses of the inactivated mouse-brain vaccine.

Dr. Pavri said a large segment of the vulnerable population, mainly children of the lower socio-economic strata of the society in highly endemic areas, would be immunised with CRI's vaccine in the coming months.

Research work by NIV scientists has proved that the natural cycle of the JE virus in India is maintained by mosquitoes and birds — mosquito *Culex tritaeniorhynchus* and *Culex vishnui* and birds, pond heron and cattle egret. The virus has also been found to be maintained from mosquito-to-mosquito from one generation to another.

In some cases the involvement of pigs in the amplification or increase in production of the virus has been established in some parts of the country.

**CATTLE'S ROLE**

"In order to check the amplification of the virus, the amplification cycle has to be broken. We have attempted this by immunising the pigs in some of the high-risk areas like Kolar and Mandya in Karnataka and are now studying its effect in reducing the incidence of the attack," said NIV scientists.

They have found only antibodies of JE virus in the cattle and buffalo population of the high-risk area and antibodies and viraemia in pigs and birds.

"India has a large cattle population and if cattle are involved in the

amplification process of the JE virus, there are bound to be extensive outbreaks of JE infection in the country. The evidence so far available indicates that cattle may serve as "blocking agents" of the JE virus and man the "dead end", said the scientists.

JE infection differs from other vector-borne diseases in that there is no direct man-mosquito-man transmission cycle. NIV scientists also said the usual method of vector control adopted in the case of diseases like malaria, is not going to help in controlling the JE vector.

**INITIAL SYMPTOMS**

The course of the infection is divided into three stages — first neck stiffness and high fever, second, infection of the central nervous system (an acute encephalitic stage marked by "CNS" signs and continuing fever and the last stage marked by either partial recovery or persistent signs of irreversible neuron damage and subsequent death.

An epidemiological survey carried out by the NIV in Karnataka, Tamil Nadu, Andhra Pradesh, Uttar Pradesh and West Bengal shows that the infection is predominantly rural and affects the lower socio-economic group.

Usually the illness occurred during the rainy season.

Of the 350 species of mosquitoes known in India, 11 are the established carriers of the JE virus and a total of 38 strains of the virus have been isolated.

"Looking at the wider issue of ecology, there is a strong suspicion that introduction of irrigation into an area, not coupled with proper water management, may lead to large sections of water in fields accumulating which may serve as breeding places for these mosquitoes.

If irrigation is introduced in an area where the JE virus is known to be epidemic there should be careful planning and a system of monitoring," said Dr. Pavri.

## FIRST INDIGENOUS LEPROSY VACCINE COMES INTO USE

New Delhi PATRIOT in English 30 Jan 87 p 5

[Text]

**Bombay, Jan 29 (UNI)**—India's first indigenous leprosy vaccine comes into use tomorrow.

The day marks World Leprosy Day and the start of the national leprosy eradication week.

The vaccine represents a triumph for Indian scientists as it overcomes two major handicaps in the production of a leprosy vaccine — the absence of a suitable animal model and the inability to cultivate mycobacterium leprae, the bacillus which causes leprosy.

The vaccine has been developed by Dr Madhav G Deo, research director in the Cancer Research Institute (CRI) here in association with the Acworth Leprosy Hospital, the KEM and G S Hospitals and the Haffkine Institute.

Dr Deo told UNI that the phase three of the mass human studies, cleared by the Union Health Ministry

and the Indian Council for Medical Research, involved about 100,000 households in the hyperendemic districts of Solapur, Latur and Osmanabad, in Maharashtra.

Tests so far of the vaccine based on a cultivable bacillus a 'close cousin' of leprae which has defied culture in the laboratory, have proved "extremely encouraging", Dr Deo said.

Of the 300 people — administered the vaccine so far — 200 healthy household contacts and 100 lepromatous (infective) patients — it was found that 95 per cent of the first group and 53 per cent of the latter developed immunity.

He said tests had shown that immunity was effective in healthy persons for at least five years. Studies were on to determine the long-term efficacy of the vaccine.

Dr Deo said one in every six of the world's 15 million leprosy patients is an Indian. The highest incidence of the disease is to be found in Tamilnadu and Andhra Pradesh followed by Orissa, Bihar, West Bengal and

Maharashtra. Nearly 400 million people face the risk of contracting the disease, he added.

Dr Deo, however, cautioned that a vaccine was only one arm of the leprosy control. Multi Drug Therapy (MDT), which had proved effective, was the other. "Vaccines are only a protective measure — it is just a bonus that we have found. It benefits the lepromatous category of patients", he added.

The only other leprosy vaccine, developed in Venezuela, is based on a bacillus grown in Armadillos and is being used by the World Health Organisation (WHO) in Africa and South Africa.

Dr N H Antia, director of the Foundation for Medical Research in Bombay and a noted plastic surgeon in the field of leprosy, points out that despite vast inputs and expenditure, the National Leprosy Control Programme initiated some 30 years ago, had failed to control the disease.

"It is wishful thinking to talk of eradicating leprosy by 2,000 AD without eradicating poverty and raising the living standards of people", he said.

/9274

CSO; 5450/0090

## BRIEFS

**GOITER IN UTTAR PRADESH**--Lucknow, 3 Feb (PTI) --About 20 districts, mostly in eastern Uttar Pradesh, are in the grip of goitre, caused by iodine deficiency, with Gonda being one of the worst-hit districts. Nearly 65 per cent of the total population in the eastern districts of the state are affected by the disease, Dr P. C. Vyas, Director-General of U.P. health services, and Mr S. C. Bhargava, zonal representative of the UNICEF office here, said in a joint address to a press conference here yesterday. The goitre endemicity stretched across the entire sub-Himalayan region including Jammu and Kashmir, Himachal Pradesh, Punjab, Bihar, West Bengal, Assam, Arunachal Pradesh and Uttar Pradesh, they said. Sample surveys by the central goitre team have shown that the disease is also prevalent in some areas of Madhya Pradesh, Gujarat, Maharashtra, Delhi and Kerala. [Text] [Bombay THE TIMES OF INDIA in English 4 Feb 87 p 7] /9274

**CHILD CANCER SUFFERERS**--Bombay, 29 Jan--At least 60,000 children are known to suffer from cancer at any given point of time in India, according to experts attending the first Asian seminar on pediatric oncology which began here today. The experts, however, emphasised that with the advance in methods of treatment, the rate of cure of cancer among children had doubled. In fact, they said, in some cases of solid tumours like kidney tumours, the cure rate was as high as 98 per cent if detected reasonably early. Nearly 250 delegates from different parts of India and abroad presented case studies and exchanged notes on the latest methods of treatment at the seminar organised by the Asian association of pediatric surgeons. Inaugurating the seminar, the governor, Dr Shankar Dayal Sharma, said that there was a general misconception among the people that cancer struck only adults. He hoped that the seminar would create an awareness about pediatric cancer so that the disease could be detected early. The well-known pediatric surgeon and head of KEM hospital's pediatric surgery department, Dr R. K. Gandhi, who is retiring on Saturday, was felicitated during the inaugural session. [Text] [Bombay THE TIMES OF INDIA in English 30 Jan 87 p 4] /9274

**MYSTERY DISEASES DEATHS**--The Calcutta Municipal Corporation authorities are worried about reports of an attack of a "mysterious" disease at North Range slum in the Beniapukur area, which has already taken a toll of six lives. The chairman of the Borough Committee No 6, compalined on Monday that so far 50 persons had been affected and three admitted to Chittaranjan Hospital. A senior official said the symptoms indicated that the disease might be a type of meningitis, the patients complaining about fever, stiffness of the body and bouts of vomiting. The slum had been disinfected and a medical team had



visited the area during the day. Water samples had been collected for examinations. The chairman of the Borough Committee has sent messages to the State and Union Health Ministers to deal with the situation on an emergency footing. [Text] [Calcutta THE STATESMAN in English 3 Feb 87 p 3] /9274

LEPROSY IN BIHAR--Jamshedpur, 1 Feb--As many as 400,000 people, affected by leprosy, have been detected in Singhbhum district of Bihar, according to the Leprosy Control and Welfare Service Advisory Board here, reports PTI. In view of this, the district was declared as the second multi-drug leprosy centre in the State. A 30-bed fully equipped hospital to treat leprosy patients was inaugurated by the State Governor, Mr P. Venkatasubaiah, at Dabamki village in the Potka block area here on the "World Leprosy Day" on Friday. In his address on the occasion, Mr Venkatasubaiah said that the Centre and the State Government had entrusted the Bharat Sevashram Sangha, a charitable religious organisation, with the task of taking effective anti-leprosy measures in Singhbhum district. The Governor said that survey conducted by the Government and various voluntary organizations throughout the State had revealed that in Singhbhum district there were 15 leprosy patients in every 1,000 people. [Text] [Calcutta THE STATESMAN in English 2 Feb 87 p 13] /9274

MEASLES EPIDEMIC--Jamshedpur, 30 Jan--Two children have died of measles at Panduburu village in Singhbhum district where the disease has assumed epidemic proportions, according to official sources. The block development officer of Majhagaon has asked the Singhbhum deputy commissioner to send doctors to the village immediately. [Text] [Calcutta THE TELEGRAPH in English 31 Jan 87 p 7] /9274

CSO: 5450/0093

## BRIEFS

GASTROENTERITIS OUTBREAK IN MALUKU--Ambon, 27 Jan (ANTARA)--At least 48 people were killed in Maluku by an epidemic of gastroenteritis spreading in the province since early December 1986. The worst was in Saumlaki of Eastern Maluku where some 40 people died, while in the Ambon city and other parts of the Ambon island, this epidemic claimed eight death victims. The figures did not include three more victims who died in the Kairatu district of Central Maluku over the weekend. Dr Andi Louhenapessy, chief of the Maluku provincial health service Tuesday described the condition of this gastroenteritis attacks as "very serious," although he said it was under control in some areas of Southeast Maluku. In Ambon and Central Maluku, the patients flooding the local public health centres as well as public, private and military hospitals continued to grow in number. At least 455 people had been treated in the hospitals, excluding those in the health centres. [Text] [Jakarta ANTARA NEWS BULLETIN in English 27 Jan 87 p A7] /9274


CSO: 5400/4330

# GOVERNMENT TAKING 'DRASTIC' STEPS TO IMPROVE HEALTH CARE

East Burnham ARABIA: THE ISLAMIC WORLD REVIEW in English No 65, Jan 87 p 70

[Article by Erik Fosse and Trond Linstad]

[Text]

 The Iranian authorities have introduced fairly drastic measures to improve the primary health services outside the cities. Better primary health care and preventive medicine in these areas are seen as being an important part of the authorities' efforts to stem migration to the towns as well as to assist in stepping up agricultural production.

When it comes to resources and general economic conditions, Iran is wealthy in comparison with most other third world countries. But in many respects, the country is also a developing nation with the traditional problems that are related to development, as for example the heavy pressure exerted on the cities (25 per cent of the country's 44 million inhabitants live in Tehran), widespread malnutrition, high infant mortality and a single export economy.

Health and social services under the Shah were reserved for the few. No general system of sickness benefit has yet been introduced even if everybody in work pays some sort of national insurance. A proposal for legislation which will ensure wider sickness and disability benefits is in preparation. Most hospitals are now state-owned and in theory everybody is entitled to hospital treatment even if there is a long way to go before national coverage is achieved.

## Primary care

The great challenge however, does not lie in hospital coverage but in the primary health service. As in other developing countries, infectious disease and malnutrition are really the big health

problems which are claiming the most lives and keeping average life expectancy down.

Half of the doctors in Iran are living in Tehran while the remainder live in the main provincial centres. This is because until the revolution, the health system was private and because the rural economy was so poor. After the revolution, the lack of doctors was made more acute as many doctors belonging to the privileged classes fled the country. Doctors who studied abroad at the expense of the State, failed to return. Today, the ratio of doctors to population is one doctor to 3,500 inhabitants.

The health problems in the rural areas were also recognised during the Shah's rule and in 1976 a primary health centre test project was started in West Azerbaijan. After the revolution, it was decided to extend the primary health service as part of a campaign to curtail the process of urbanisation. The health authorities' main task is now to develop the health and social service programme in the rural areas.

Primary health services are organised on three levels. The first is the local health centre. Each health centre must serve 500-2,000 people. There are no doctors in the health centres but male and female nursing staff with basic education and two years' practical experience. In the centres, emphasis is given to teaching hygiene to expectant mothers, general hygiene and mother/baby care. They provide first aid and vaccination as well as initiating preventative measures against malaria for example. There are today some 3,950

centres like this which meet about half the actual need.

#### **Secondary level care**

The second level in the health service is represented by medical centres. There are currently 1,100 medical centres in the cities and some 2,000 in rural districts. Out in the country medical centres are located in the larger villages and in the main regional towns. Until now it has been difficult to staff these with Iranian doctors and they have been dependent on doctors from India, Pakistan and Bangladesh. The authorities have started a campaign to get Iranian doctors out into the rural districts and, in January 1986, a law was passed which requires all newly qualified doctors to work in State projects in poor rural areas for one and a half times the length of their studies before they are entitled to open their own practices or to specialise. Since the study qualification time in Iran is six years, this means a nine year term in State service. Student intake from the poor rural areas will also be given priority so that 60 per cent of new students will originate from such districts. (According to the Act, war veterans, relatives of men killed in action and former prisoners of war will also be given priority so that 25 per cent of student places are earmarked for these persons). The medical facilities in Iran currently take in some 4,000 new students annually and there is a target of more than 50,000 doctors qualifying in the next ten years. The new Act also allows for doctors to do their two years national service in the rural areas. The authorities are also working on a scheme to get Iranian doctors practising abroad to come home.

The third tier in the health service is the hospital. After the revolution, the authorities tried to maintain hospital standards without extending them. Foreign doctors are also working in the hospitals.

It is quite clear that the war with Iraq is tying up a considerable amount of the health resources. All doctors must serve one month per year in the front line or in

hospitals that are tending the wounded. Even so, the primary health service has been extended during the course of the war. The number of primary health centres has risen from 3,259 in 1982 to 3,950 in 1985 while 500 new medical centres have been set up in the same period. 300 of these are in the rural villages and towns.

#### **Infant mortality**

Infant mortality (the number of children dying before their first birthday), is reckoned to be an important social development indicator. In 1979 the infant mortality rate was 13 per cent in the villages – by May 1985 it was 7.2 per cent. The reduction in the rural mortality rate can be attributed to several factors. The most important of these is certainly the general improvement in living conditions. One government department, Jihad-e-Sazandegi, has the task of reversing the flow of population into the cities by improving the standard of rural life. The department is taking roads and electricity to the villages. It is drilling for water and constructing dams. Today, 55 per cent of the rural population has access to proper drinking water. In 1985 US\$ 150 million was earmarked for increasing the availability of proper drinking water.

When one looks at the results which have been attained in the health sector, it is important to take into account the special conditions under which those results have been achieved. Since 1979, Iran has taken in between 1.5 and 2.0 million Afghan refugees. This must certainly be one of the reasons why there has been an increase in TB in certain provinces. Half of the malaria cases registered in 1985 were among the Afghan refugees. The war against Iraq has also brought a considerable volume of refugees in its wake. This has led to heavy population concentrations, difficult sanitary conditions etc. The war with Iraq continues to place a general burden on the health services and the hospitals.

/13046

CSO: 4600/124

# HEALTH MINISTER OPENS EXPANDED IMMUNIZATION PROGRAM

Maputo NOTICIAS in Portuguese 3 Feb 87 p 1

[Text] Yesterday morning [February 2] in Maputo, the first international course on PAV--the Extended Vaccination Program to Combat Diarrheic Diseases--began. This course is being sponsored by the World Health Organization (WHO), and is scheduled to run for 13 days. The opening session, which drew participants from health personnel from the five Portuguese-speaking countries, namely Mozambique, Angola, Guinea-Bissau, Cape Verde, and Sao Tome and Principe, was chaired by Fernando Vaz, the minister of health.

Present at the opening of the meeting, which is being held in the facilities of the Regional Sanitary Development Center in the George Dimitrov neighborhood, were: Igrejas Campos, the vice-minister of health; Dr Manuel Boal, the WHO representative in our country; and Marta Mauras, the representative of the United Nations Childrens Fund in our country; along with representatives of several development sectors which have an impact on health in the country.

The basic objective of the course is to increase the effectiveness of the extended vaccination program in the participating countries, as well as to increase these countries' ability to analyze available resources and improve the program's efficiency. The course likewise aims to qualify the participants to carry out and supervise programs of specific actions back in their home countries, and to organize practical courses at the local level, in order to fulfill the philosophy of primary health care, which is defined as "health for all in the year 2000."

The minister of health, Fernando Vaz, speaking during the official opening session of the course, spoke of the importance of the extended vaccination program and of the dimensions of the problems of diarrheic diseases in our country. He also spoke of the efforts that our government is undertaking to establish immunization of the infant and juvenile population against diseases that significantly influence the disease and mortality rates of these age groups.

Referring to the importance that the five Portuguese-speaking countries should attribute to this event, the minister of health explained: "The World Health Organization, in coordination with other organizations in the United Nations system, namely UNICEF, PNUD, AND FNUAP, has been exerting efforts to establish the appropriate mechanisms to carry out programs of action in the different countries, in the sense of defining strategies with clear and concrete goals, so as to reduce the scourge which the high rates that several countries have been registering represent for them."

The health minister, in explaining the effects of diarrheic diseases in our country during 1985, indicated that the average infant mortality rate reached an estimated 160 percent [sic], varying from lower figures in the big cities to higher figures in the surrounding regions. The minister of health further explained that our country does not yet have available a program to combat these diseases. They are being eliminated through specific actions contained in other programs. For example, the program of epidemiology and combatting endemic diseases is responsible for monitoring diarrhea epidemics and epidemiological research, while Health Education prepares educational materials and coordinates actions when a particular incidence of diarrhea occurs.

According to Minister Vaz, studies have already been carried out which included the cities of Beira and Quelimane, with a system of selective testing by groups, as recommended by the WHO. Studies have also been carried out in the cities of Inhambane, Tete, and Chimoio, in urban health centers in Tete, Lichinga, and Maputo, and rural meetings in Mavago, in the province of Niassa, and in Morrumbene, in Inhambane. The data furnished by the studies in Beira indicated a mortality rate from diarrhea of 14.7 percent in the age group less than five years old, while the data from Quelimane showed a rate of 4.1 percent in the same age group.

As for the PAV, the minister of health stated that the proposed goal of vaccinating 90 percent of susceptible children in the city of Maputo by the end of last year was satisfactorily reached. This achievement, as the health minister would add, was the result of mobilization, action, and a sense of responsibility from all those who participated in the vaccination campaign.

Meanwhile, eight facilitators for discussion and debate of the points brought up during the course are available to the participants, who, in addition to theoretical actions, will have to carry out practical research projects in the area on the community's experiences in implementing these two fundamental programs for children's health.

9895

CSO: 5400/97

BRIEFS

PAV PROGRAM TARGETS CHILDHOOD DISEASES--During the first phase of the accelerated vaccination program [PAV] which took place between the months of July and August of last year in Beira, 9,000 children with various abnormalities were identified. In an interview with Radio Mozambique, the head doctor and program coordinator stated that out of those 9,000 children, the majority were underweight and had not received a complete series of vaccinations. He further stated that during the course of the program, 1,000 cases of pregnant women not observing their pre-natal consultations were registered. Meanwhile, it is known that the second phase of the accelerated vaccination program will shortly be in motion. Preparations to that effect are under way at this moment. [Text] [Maputo NOTICIAS in Portuguese 5 Feb 87 p 3] 9895

CSO: 5400/97

## EPIDEMIC HEMORRHAGIC FEVER

Beijing CHINESE MEDICAL JOURNAL in English Vol 99, No 1, Jan 86 pp 21-26

[Article by Wang Jiarui [3769 0857 3843], Yang Peizhen [2799 0160 3791], Wu Qian [0702 6197], Sun Tao [1327 3447], et al., Department of Infectious Disease, Huashan Hospital, Shanghai First Medical University, Shanghai: "The Role of Tissue Immune Complex, Complement Activation and Its Immunopathologic Injury in the Pathogenesis of the Epidemic Hemorrhagic Fever"]

[Text]

Forty-six patients with epidemic hemorrhagic fever (EHF) admitted during 1982-1983 were studied, including detection of immune complexes on the surface of RBC and platelet, hemorrheology, platelet agglutination function, biopsy of cutaneous petechiae and observation of complement activation. The study indicates that the pathogenesis of EHF is closely related to the immunopathologic injury of the host.

Further studies were carried out on the pathogenesis of EHF, including detection of immune complexes on the surface of RBC and platelet, hemorrheology, platelet agglutination function, biopsy of cutaneous blood vessel and observation on the complement activation and its pathway.

### PATIENTS AND RESULTS

46 cases of epidemic hemorrhagic fever (EHF) were observed from 1982 to 1983. Of these 24 were male and 22 female. Their age ranged from 15-55 years with an average of 29. According to the severity of the disease they were divided into 3 categories, mild, moderate and severe. Investigation was made on the detection of immune complexes on the surface of RBC (14 cases) hemorrheology (43 cases), immune complexes on the surface of platelet (22 cases), platelet agglutination function (45 cases), biopsy of cutaneous petechiae (3 cases), circulating immune complexes (40 cases),  $C_{3c}$  (46 cases),  $C_{1q}$  (31 cases) and  $C_3$  (31 cases), etc.

**Observation on the red blood cell.** *Detection of immune complexes on the surface of RBC.* Immune complexes were found in 6 of the 14 cases by indirect immunofluorescent (IF) technique, the positive rate of detection being 42.8%. Analysis of the components of the immune complexes showed that the immune complex was specific. In addition, RBC showed aggregation (Fig 1).

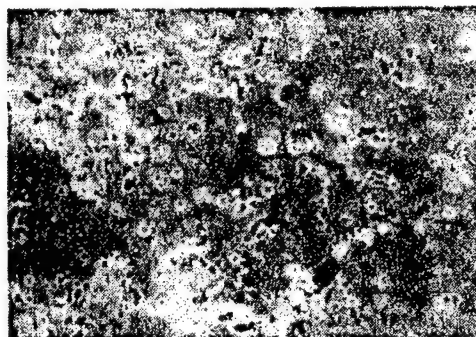


Fig 1. Deposition of specific immune complexes on the surface of RBC under the microscope in patients with EHF resulting in RBC aggregation.  $\times 300$

**Observation on hemorrheology.** At different clinical stages, hemorrheological study including blood viscosity, plasma viscosity, packed cell volume and ESR was made in 43 cases, showing mild abnormalities in 13, moderate in 11 and severe in 19. Normal reference values were taken



from healthy men and women of 20-30 years old (Fig 2).

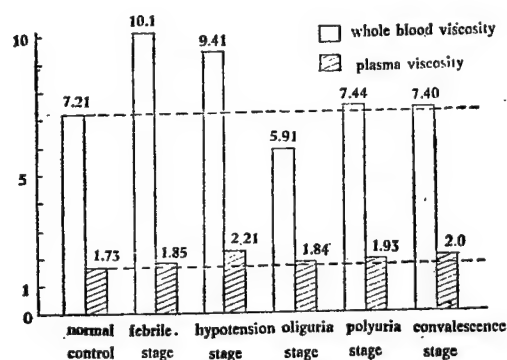


Fig 2. Whole blood viscosity and plasma viscosity at different clinical stages.

The most significant increase of whole blood viscosity occurred during the febrile stage. Plasma viscosity also increased at various clinical stages. Packed cell volume increased obviously during the hypotension stage. Whole blood viscosity decreased markedly during the oliguria stage, and then the whole blood viscosity returns to normal during polyuria stage. ESR increased at all stages.

Observation on the platelet. *Detection of immune complex on the surface of platelet.* Immune complexes were found on the surface of platelets by indirect IF technique in 10 of the 22 patients the rate positive of detection being 45.4%. The immune complexes was specific. There was platelets aggregation under the microscope (Figs 3,4).

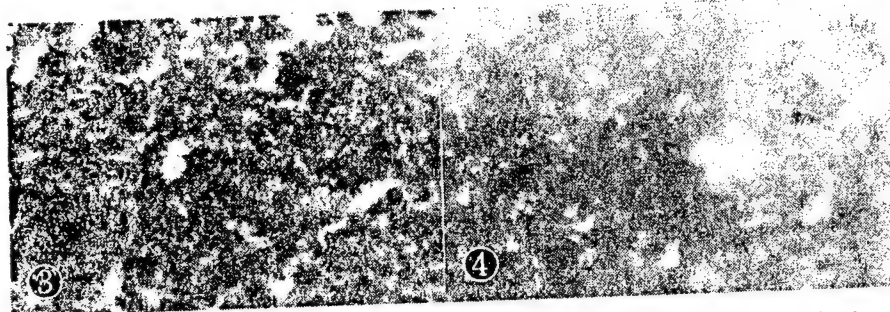


Fig 3. Deposition of specific immunofluorescent granules on the surface of platelet under the microscope.  $\times 300$

Fig 4. Platelets showing aggregation.  $\times 600$

*Detection of platelet agglutination function (PAF).* The PAF in 45 patients with EHF was studied with a specially designed apparatus. Platelet count revealed that the normal platelet agglutination rate was  $53 \pm 7.9\%$ . Platelet agglutination dysfunction was observed in 41 of the 45 cases (91.1%), and PAF was less than 10% in 31 (68.9%). The PAF at different stages of the disease was: it was impaired and less than normal in 41 of the 45 cases with fever during the febrile stage, in 9 of 11 cases with shock during the post shock stage, in all of 14 cases with oliguria during the oliguria stage, and in 7 of 20 cases with polyuria during the polyuria stage; and PAF was reduced to less than 10% in 19 of 45 cases during febrile stage. In 4 of 11 cases during post shock stage, in 11 of 14 cases during

oliguria stage, and in one of 20 cases during polyuria stage (Fig 5).

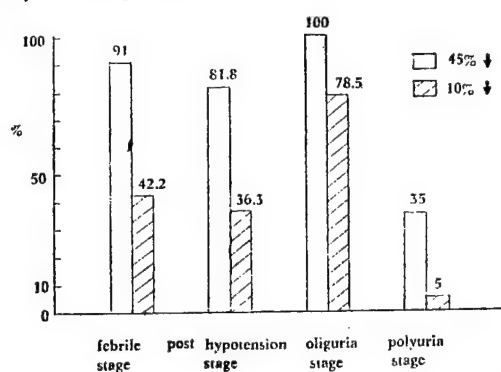


Fig 5. Platelet agglutination function in different clinical stages of EHF (45 cases).

Fig 5 shows that the most remarkable platelet agglutination dysfunction occurred during the oliguria stage.

*The relation of platelet agglutination function to the severity of the disease.* Table 1 shows that the degree of impairment of platelet agglutination function was related to the severity of the disease.

*Platelet agglutination function in relation to bleeding.* Of the 45 cases, 3 had gastrointestinal bleeding, 4 had hemoptysis, 3 had intracranial bleeding, 4 had epistaxis and 3 had oral cavity bleeding. In patients with bleeding, the PAF was generally poor, mostly dropped to below 10%, and 4 to zero. Clinically there was very severe and uncontrollable bleeding. All died eventually.

Table 1. The relationship between platelet aggregation and the severity of the disease

| Type     | Cases | 1 $\mu$ m ADP  |                 | 50 $\mu$ m adrenalin |                |
|----------|-------|----------------|-----------------|----------------------|----------------|
|          |       | 40"            | 2'              | 40"                  | 2'             |
| Mild     | 13    | 21 $\pm$ 15.2  | 33.1 $\pm$ 27.5 | 8.8 $\pm$ 12.4       | 21 $\pm$ 30.9  |
| Moderate | 13    | 14.3 $\pm$ 9   | 18.9 $\pm$ 14   | 4.6 $\pm$ 6.2        | 7.8 $\pm$ 16.3 |
| Severe   | 19    | 11.6 $\pm$ 9.3 | 12.9 $\pm$ 11.1 | 2.9 $\pm$ 4.0        | 4.8 $\pm$ 8.1  |

*PAF in relation to renal dysfunction.* In 21 cases the PAF was studied in concomitance with the determination of blood NPN during the oliguria stage to observe the relation between the PAF and the renal dysfunction (Fig 6).

Fig 6 indicates that the degree of the PAF impairment to the increment of blood NPN, and PAF restored gradually to normal with the decrease of blood NPN level, indicating that it was related to renal dysfunction.

**Observation on the change of the blood vessel.** Biopsy of cutaneous petechia was taken from the axillary region in 3 patients, in one it was done on the 5th day of the disease during the hypotension stage, and in the other two on the 6th day during the oliguria stage. Immune complex was detected on the endothelium of the cutaneous blood vessel in 2 cases with exudation of platelet and blood cells through the wall of the vessel under the microscope (Fig 7).

**Observation on the complement activation.** *Detection of the  $C_3$  cleavage product  $C_{3c}$  as well as complement activation and its intensity.*  $C_{3c}$  was detected by crossed electrophoresis technique.  $C_{3c}$  positive indicated that there was complement activation.  $C_{3c}$  detection was done 129 times at different stages. Fig 8 shows that the peak of complement activation appeared during the hypotension stage. Although there was complement activation during the febrile and oliguria stage, yet it is slight. Complement activation disappear-

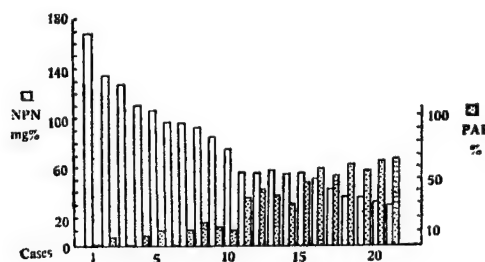


Fig 6. Platelet agglutination function and blood non-protein nitrogen (NPN) in 21 cases of EHF during oliguria stage.

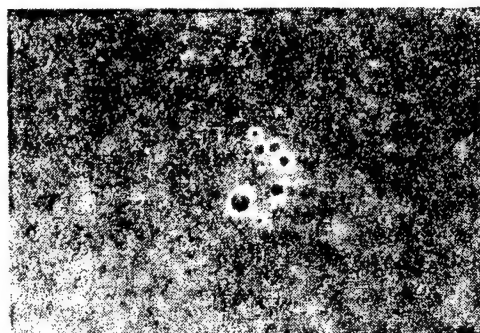


Fig 7. Immunofluorescent granules deposited on the endothelium of cutaneous capillaries, with red blood cells and platelets seeping through the vessel walls.  $\times 300$

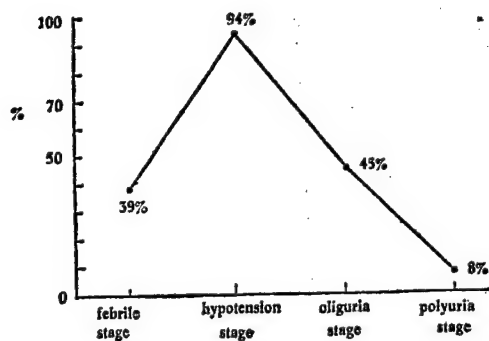


Fig 8. Detection rate of complement activation in patients with EHF at different clinical stages.

ed gradually in the convalescence stage. Fig 9 shows that intensity of complement activation paralleled with its detection rate.

Observation on the complement activation pathway (comparison of  $C_{3c}$  positive with  $C_{1q}$

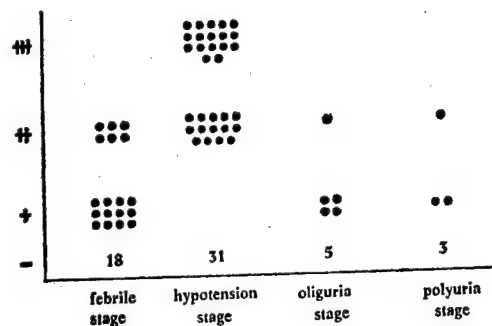


Fig 9. The intensity of complement activation in patients with EHF at different clinical stages.

level).  $C_{1q}$  was detected by the simple phase diffusion method. A value less than 27 units (normal value  $47.7 \pm 20.16$  u) is designated as low  $C_{1q}$  content (Table 2). The complement was found activated both through the classical and alternative pathways.

Table 2. The observation on the complement activation pathway (comparison of  $C_{1q}$  levels of  $C_{3c}$  positive patients at different clinical stages).

|                   | $C_{3c}^+$ | $C_{1q}$ decrease |      | $C_{1q}$ Normal |      |
|-------------------|------------|-------------------|------|-----------------|------|
|                   |            | Cases             | %    | Cases           | %    |
| Febrile stage     | 18         | 5                 | 27.7 | 13              | 72.3 |
| Hypotension stage | 31         | 29                | 93.5 | 2               | 6.5  |
| Oliguria stage    | 5          | 4                 | 80.0 | 1               | 20.0 |
| Polyuria stage    | 3          | 2                 | 66.6 | 1               | 33.3 |

Complement activation in relation to immune complexes.  $C_{3c}$  and immune complexes were detected in 40 cases at the febrile stage, and in 20 at the hypotension stage. During the febrile stage the immune complexes in the 20  $C_{3c}$ -negative cases had a low titer of 1:2 to 1:4. During the hypotension stage,  $C_{3c}$  was positive in all the 20 cases, and their immune complexes showed a high titer of 1:8-1:32. This indicates that during the febrile stage there was no close relation between the complement activation and immune complexes, while during the hypotension stage complement activation does relate closely to the immune complexes (Fig 10).

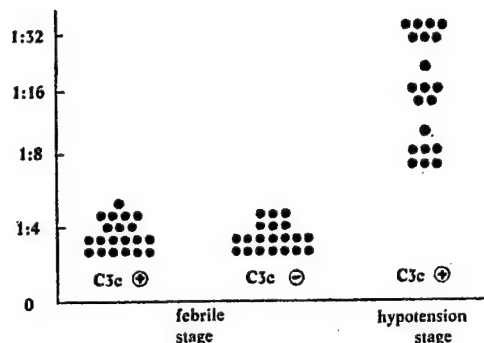


Fig 10. Determination of  $C_3$  and CIC in patients during the febrile stage and hypotension stage.

## DISCUSSION

The pathogenesis of EHF we studied since 1973, was found to be compatible with certain immune response of the host to the virus infection,<sup>1</sup> with humoral immunity enhanced, cellular immunity suppressed, serum complements decreased, and specific antibody appearing promptly at the early stage of the disease resulting in formation of circulating immune complex (CIC). Renal biopsy specimens, examined by electronmicroscope and immunofluorescent technique revealed deposition of immune complexes on the basement membrane of glomeruli during the early course of the disease.<sup>2,3</sup> These findings help explain the cause of renal damage and albuminuria.

In 1982 further study on the pathogenesis of the disease was made. It was found that the immune complexes were distributed not only on the renal tissues but also over various tissues of the body, including the endothelium of blood vessels, platelets and red blood cells. Platelet smears in 10 of 22 cases (45.4%) and red cell smears in 6 of 14 cases (42.8%) showed typical fluorescence suggestive of the existence of immune complex.<sup>4</sup> By antibody blocking test the above immune complexes were specific. The immune complex deposition on platelets brought about agglutination and destruction of a large number of platelets. Platelet count was decreased at the early stage of the disease, but with the progress of the disease a large amount of platelets were exhausted in filling the damage on vessel walls and in the development of DIC. Thus there was a sharp drop in the number of platelets. Meanwhile, the platelet agglutination function was examined to determine the effect of the immune complex deposition. The result showed that there was apparent platelet agglutination dysfunction (91%), being less than 10% in 69% of the cases. It is clear that during the oliguria stage the platelet function suffered the most, a revelation conforming with the serious bleeding at this stage. The degree of platelet agglutination dysfunction paralleled with the severity of the disease and the extent of bleeding. When PAF

dropped to zero, most of the patients eventually died from serious bleeding. Retention of blood NPN as a result of renal damage might aggravate the severity of platelet agglutination dysfunction. PAF determination is valuable in predicting the tendency of bleeding and its prognosis as well as a useful guide to the control of the disease.

The effect of immune complex deposition on the red blood cell was observed hemorrheologically. It turned out that the whole blood viscosity, plasma viscosity, packed cell volume, and ESR were all markedly increased. In the febrile stage, the increase of the whole blood viscosity was most notable, suggesting that the hemorrheological change is closely related to the immune response of the host.

Cutaneous petechiae biopsy revealed deposition of immune complexes on the capillary endothelium, with blood cells and platelets seeping through the vessel walls under the microscope, a consequence of vascular damage caused by immune complex deposition, precipitating hypotension and bleeding. Renal ischemia and hemorrhagic change may cause oliguria and acute renal failure.

Observations on complement activation showed that it started early in the febrile stage (39%), reached its peak at the hypotension stage (94%), began to decrease at the oliguria stage (45.4%), and ceased at the polyuria stage (8%). The intensity of complement activation went in parallel with its detection rate. The complement activation was most noticeable at the hypotension stage, being in conformity with the degree of damage of vessels. The complement activation through both alternative and classical pathways was proved by the detection of  $C_{3c}$  and  $C_{1q}$ . Complement activation by the alternative pathway was probably related to the virus of EHF or its toxin, causing degranulation of mast cells and release of vasoactive substances. Damage of platelets also released vasoactive substances, resulting in vasodilatation and then enhancement of vascular permeability early in the course of the

disease. This probably explains the clinical manifestation of congestion of the skin and mucous membrane, bulbar conjunctival edema, etc. In the wake of the increase in the titer of immune complexes, the complement was activated obviously through the classical pathway. It also caused serious damage to the vessel, and resulted in exudation of plasma and formed elements, leading to hypotension shock and a series of pathological changes. Hypotension shock occurred by the time activation of complements

reached its peak. Therefore, the determination of the complement activation is of great value in the prediction of shock, facilitating prevention in advance.

The above studies indicate that EHF is resulted from immunopathological injury of the host. Immune complex formation, widespread deposition of tissues, and complement activation may play an important role in the pathogenesis of the disease.

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CSO: 5400/4115

EPIDEMIOLOGICAL SURVEY ON MENTAL RETARDATION IN BEIJING CHILDREN

Beijing CHINESE MEDICAL JOURNAL in English Vol 99, No 1, Jan 86 pp 9-14

[Article by Zuo Qihua [1563 0796 5478], Zhang Zhixiang [1728 5268 4382], Department of Pediatrics, First Teaching Hospital, Li Zhu [2621 4554], Qian Yubing [6929 1342 1627], Department of Epidemiology, Faculty of Public Health, et al.: "An Epidemiological Study on Mental Retardation Among Children in Chang-qiao Area of Beijing"]

[Summary] An epidemiological survey on mental retardation (MR) among children below 14 years of age in Chang-qiao area, Beijing city, was conducted. MR was defined in this study as subaverage intelligence with concurrent deficits in adaptive functioning. A multidisciplinary team was organized and trained. Data about the children and their families were collected in detail. MR cases were discovered through medical information, family interview and inquiring into clues, and by the developmental testing. A matched-control study (case: control = 1:4) was also conducted. The investigation rate was 93.1 percent. Among the 7,150 examinees, 56 cases of MR were identified, a prevalence of 0.8 percent. By the severity of MR 35 cases (62.5 percent) were mild, 16 (28.6 percent) moderate and 5 (8.9 percent) severe. The etiological analysis showed biomedical factors in 34 cases (60.7 percent), of which 7 (12.5 percent) had hereditary diseases and 25 had brain damage due to various environmental factors (44.6 percent). In the 22 cases without abnormal clinical findings, psycho-socio-cultural factors were found obviously in 11 (20.4 percent). Twenty-two of the 35 mild cases of MR were presented without biomedical abnormalities, whereas all the moderate and severe cases were biomedically abnormal. The matched-control study showed that 17 factors were statistically different between propositae and controls, in which 12 were prenatal or perinatal in character, and 5 were postnatal factors. The results of this study pointed to the importance of early prevention and early management of MR. An outline for approaches to prevention of MR was suggested.

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CSO: 5400/4115

LYMPHOCYTIC AND HEPATOCYTIC CHANGES IN CHRONIC HEPATITIS B, THEIR BEARINGS ON VIRAL REPLICATION

Beijing ZHONGHUA YIXUE ZAZHI [NATIONAL MEDICAL JOURNAL OF CHINA] in Chinese  
Vol 66 No 11, 15 Nov 86 pp 645-647

[English abstract of article by Teng Xince [3326 2450 4595], et al., of Beijing Command General Hospital]

[Text] Immunologic and pathologic studies were carried out by the authors on 39 patients with chronic hepatitis B and three HBsAg carriers. In the patients without markers of HBV replication, no severe histologic changes were seen. In those with positive markers of HBV replication, the phenomenon of lymphocytic attack on hepatocytes was closely correlated with the severity of liver tissue changes. These suggest that chronic hepatitis B is mainly the result of the immunologic response of the patient to HBV. It was also found that the width of interhepatocytic space under electronmicroscopy is closely related to liver tissue changes. Whether this can be used as a marker to distinguish chronic active from chronic persistent hepatitis awaits further investigation. (Paper received 31 Jan 86; revised 3 Jul 86.)

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DETERMINATION OF BKV ANTIBODY IN DIFFERENT AGE GROUPS IN BEIJING POPULATION

Beijing ZHONGHUA YIXUE ZAZHI [NATIONAL MEDICAL JOURNAL OF CHINA] in Chinese  
Vol 66 No 11, 15 Nov 86 pp 648-649

[English abstract of article by Lin Jingping [2651 2734 1627], et al., of  
Beijing Medical College]

[Text] A total of 323 samples of human sera from various age groups in a population of Beijing was examined for BK virus (BKV) antibody with the HI test. The prevalence of the BKV antibody was 25.0 percent in the 1-3 year old age group, and it then increased with age. In the 25-35 year group, 76.3 percent had BKV antibodies. The prevalence declined slightly in the older age groups. The prevalence and titer of the antibody are discussed and compared with those in the populations of other countries. (Paper received 19 Aug 85; revised 10 Jul 86.)

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EPIDEMIOLOGIC ANALYSIS OF CEREBRAL APOPLEXY AMONG 700,000 IN BEIJING

Beijing ZHONGHUA YIXUE ZAZHI [NATIONAL MEDICAL JOURNAL OF CHINA] in Chinese  
Vol 66 No 11, 15 Nov 86 pp 653-657

[English abstract of article by Chen Danyang [7115 0030 7122], et al., of  
Beijing Cardiopulmonary Medical Research Center]

[Text] In this article the authors report the results of an epidemiologic survey of cerebral apoplexy among a population of 700,000 in Beijing in 1984. The methods and criteria used in the investigation are those from the WHO MONICA PROJECT and MANUAL. In 1984, a total of 845 patients (aged 25-74 years) with cerebral apoplexy were registered. Of them, 509 had initial onset of the condition. The case missing rate was 7.7 percent. The incidence of cerebral apoplexy was 193.8/100,000 (221.2/100,000 for males and 167.0/100,000 for females). First incidence rate was 116.7/100,000 (males 129.8/100,000, females 103.9/100,000). The national adjusted incidence was 183.5/100,000, and the world population adjusted incidence was 239.4/100,000. Compared with other countries, the incidence of cerebral apoplexy in Beijing is higher.

The proportion of different types of cerebral apoplexy among these 845 cases is as follows: cerebral infarction 53.6 percent, hemorrhage 41.8 percent. The case fatality rate of cerebral apoplexy in the acute phase is 33.8 percent and 39.5 percent for the first and fourth weeks respectively. The case fatality rate is the highest in cases of intracerebral hemorrhage (71.3 percent) and lowest in cerebral thrombosis (14.6 percent). (Paper received 10 Oct 85; revised 19 Aug 86.)

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ACADEMY OF SCIENCES REPORT ON STATE OF EPIDEMIOLOGY

Warsaw PRZEGLAD EPIDEMIOLOGICZNY in Polish No 2, 1986 pp 236-239

[Article: "Situation and Prospects of Epidemiology in Poland"]

[Excerpts] The following article is a product of discussions in the framework of the Epidemiology Commission of the Human Ecology Committee of the Polish Academy of Sciences [PAN] concerning the points of the position paper prepared for the Third Congress of Polish Science.

The article describes the achievements of epidemiology in Poland and the difficulties in the development of this discipline at the current stage, revealing the sources of these difficulties and outlining the areas that should be developed.

For most of its history epidemiology was concerned with the regularities of proliferation of communicable diseases. This was due to the predominant role of infection in forming the health conditions of a population. This concept determined the directions of epidemiologic research in the first postwar years in Poland, which was directed against dangerous contagious diseases, especially typhoid, typhus, malaria and diphtheria. On the basis of innovations in applying the previously known principles of fighting these diseases, research and development was promoted that made it possible to control the efforts at stopping the proliferation of these diseases by using the results obtained in laboratories; the spread and improvements of these methods earned Polish epidemiology a world renown. This position was further strengthened in the 1950's and subsequent years by studies of relapsing fever, controlled investigations of the efficiency of typhoid and measles vaccines, polio vaccination side-effects and other studies. Participation in these activities and investigations produced a large and stable group of competent "epidemiologists of infectious diseases."

In time, studies of noncommunicable disease were also developed. In the 1950's and 1960's several studies were done on proliferation of endemic goiter and the efficiency of countermeasures; in the mid-1960's studies on the incidence and conditions of chronic nonspecific lung diseases were initiated in Krakow, which have been continued until the present time and have strengthened the importance of Polish epidemiology in the world arena. At about the same time research was initiated on the correlations between

the spread of circulatory diseases and urbanization processes, a registry of malignant neoplasms was instituted, and studies were launched to determine the social conditions of public health and physical fitness and the health status of the population as defined on the basis of health center statistics, as well as many other research projects to evaluate the health status of the population and gain deeper insights into disease etiology.

In the 1970's Polish epidemiologists began to study vascular complications of diabetes and joined a European experimental research project on the prevention of coronary disease; systematic studies on health care were initiated, research on the causes of nonspecific lung disease were continued, and several surveys and etiological studies were performed. Despite the numeric growth of publications in epidemiology, a gap appeared and increased between the level of scientific activity in this field in Poland and in the world. The reasons for this situation should be seen both in terms of the crisis experienced by Poland and in the difficulties confronted by epidemiology in the traditional sphere of its investigations.

### **The Epidemiological Situation in Poland**

Most of the studies currently conducted in Poland are of a descriptive nature, while etiological investigations are undertaken less often. Among the reasons for this situation, which is unfavorable in terms of Poland's participation in the development of world science in this field, the following should be mentioned:

- 1) the need for a systematic collection of data on the health situation of the population, especially at a time of increasing environmental, professional and public hazards;
- 2) a growing methodological backwardness, especially with regard to statistical capabilities due to growing isolation of the scientific community from leading world research centers, as well as the shortage of pertinent statistical software and foreign literature;
- 3) insufficient spending by science institutions on up-to-date laboratory equipment, computers and even reagents;
- 4) shortage of finances and personnel for ambitious analytical and experimental projects;
- 5) lack of a well-defined division of functions between the various institutions in collection and analysis of data, which sometimes leads to overburdening of research institutions with these responsibilities; and
- 6) failure to make use of the results of scientific studies and analysis for decision-making at various government levels, which is probably the most important source of the lack of motivation for progress in epidemiology.

Interest in scientific research on the part of science administrators is overpowered by administrative duties or by giving preference in their work to extra scientific objectives. As mentioned above, the situation of epidemiology is affected by the little importance attached to the information on population health it provides and the efficiency of its efforts, etc., in the course of decision-making, affecting Poland's health policies, although health needs should top the list of factors to be considered.

The difficulties of epidemiology are compounded by increasing manpower shortages, mainly due to insufficient influx of young physicians. This situation, however, should not be equated with a decline of this discipline, because the contribution of sociologists, biologists, mathematicians and other specialists to epidemiological research can produce comprehensive analysis of the projects that are undertaken. It is important to introduce a system of research which would accommodate a wider participation of other specialists as well as doctors. A complete absence of physicians in research teams, however, can cause a complete loss of the goals of epidemiology, depriving it of the necessary medical expertise.

#### **Development Prospects and Conditions of Polish Epidemiology**

Despite insufficient use of the results of epidemiologic studies and health expert findings, epidemiology remains the main basis for efficient activity for the benefit of public health. In this light, the need for epidemiologic research in Poland is determined by the health situation of the population and the prevailing health and social conditions. A comparison of Polish data with those of other countries shows that the health situation in Poland is inferior to that in many European countries in various respects. Even in development age groups, where a substantial reduction of mortality has been achieved, Poland trails far behind other European nations, and in productive age there has been a mortality growth compared with 1960 data, the largest in Europe. The predominant causes are circulatory diseases, particularly coronary ischemia, malignant neoplasms (especially lung cancer), accidents, trauma and poisoning. The statistics for women in this age group are more favorable but are deteriorating compared with European averages. Basic and thorough research is necessary to discover the sources of these unfavorable demographic trends.

The deteriorating status of the population's health is furthered by the fact that society in general underestimates the importance of health, as well as by poverty of certain demographic groups. In cigarette and alcohol consumption Poland is among the world's leaders, while health-promoting habits enjoy little popularity. Among other things, this is indicated by the per capita structure of personal spending for 1983 in Poland: That year, 15 percent of personal income was spent on alcohol, 2.5 percent on tobacco, while personal hygiene articles amounted to 1.9 percent and sports, tourism and leisure items just 1 percent (ROCZNIK STATYSTYCZNY GUS, 1984). Membership in sports education organizations has been declining: from 2.977 million in 1970 to 2.939 million in 1980 and 2.159 million in 1983. The membership of sports clubs in the same period was the following: 641,000 in 1970, 324,000 in 1980 and just 284,000 in 1983.

Inadequate health care in Poland has a pronounced social stratification. According to data for the mid-1970's, 8 percent of Polish families in the lowest income bracket accounted for 32 percent of infant deaths, including 15 percent in cities and 44 percent in villages, while 2 percent of families who had a housing of five square meters or less per person accounted for 14 percent of infant deaths; in the meantime, the proportion of infant deaths among mothers with a college education level was 19 per 1000 live births, while among mothers with incomplete basic education it was 56, or nearly three times as high. The contrasts are even stronger in regard to mortality for so-called exogenic (or preventable) causes. In the college-educated group the mortality factor of infants was 3, while in the group with incomplete basic education it was 10 times as high, or 30 per 1000 live births. These data call for active countermeasures against these negative phenomena, which should include innovative ideas on the part of doctors and monitoring of the efficacy of the efforts at improvement of the current situation, in particular by means of epidemiological methods.

The need for expanding epidemiological research stems also from the deteriorating conditions of the natural environment in Poland, a continuing lack of work safety and the inadequate sanitary situation in the country. Although some are saying that when one is threatened one should act and not investigate, previous experience in the fight against infectious disease in Poland shows that availability of current information is most effective for making actions efficient and successful. Experience also shows that efforts against the consequences of the environmental health hazards are helpful in leading to a correct appraisal of the current situation. The role of epidemiology is not limited here (as well as in other spheres) to investigative functions but also includes monitoring, diagnostics, norm setting and other activities.

Realizing the importance of these studies of population health, one must try in the future to improve the systems of data collection and make analysis more comprehensive. It is also important to frequently undertake analytical and experimental studies, which are necessary, among other things, for educating a new generation of scientists. We must close the growing gap in skills and facilities between Poland and the more-developed nations. This especially concerns a wider use of new technologies, allowing effective analysis of qualitative data on the basis of better acquaintance with these methods and a broader availability of the appropriate computer systems and software and the use of faster and easier-to-handle computers. While fully appreciating the contributions of Polish epidemiologists to etiological studies, we should not overlook the current trend in the world for unconventional applications of descriptive data, such as for resolution of local health problems, as is done, for example, in Sweden, or collection of such data to discover effects inaccessible to other methods, such as with the Monica program employed to determine etiology of cardiac insufficiency.

In summarizing, it should be said that, although it is desirable to develop epidemiology as an area of scientific research with its own cognitive goals on a par with other medical sciences, its principal function is to be a

tool of protecting and strengthening public health. For this reason the future plans of development of epidemiology should emphasize its instrumental and practical functions, and particularly with regard to data collection and monitoring, as well as specifically defined research goals achieved with effective and up-to-date means of implementation. Efforts should be undertaken to prevent the deepening crisis, in particular in the availability of manpower for scientific and practical epidemiology; this situation requires action in various directions, including changes in manpower development policies. These should give priority to this area in view of its basic importance, with offerings of undergraduate and graduate studies, in particular in the form of a public health school and greater opportunities for young scientists to study abroad; expanding the facilities by acquisition of new laboratory and computer equipment and other means, such as diagnostic tests. Scientific activities in epidemiology should not be limited to reporting and descriptive surveys, although these are also important areas, but should use epidemiology primarily as a tool for understanding the sources of major health problems and as an instrument for measuring the efficiency, productivity and reliability of methods, actions and programs in the public health sphere.

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CSO: 5400/3007

REPORT ON AIDS PRESENTED AT MEHEDINTI MEDICAL CONFERENCE

Bucharest MUNCITORUL SANITAR in Romanian 2 Dec 86 p. 3

[Article by Dr Nicolae Popescu: "For the Improvement of the Health of the Population"]

[Excerpts] Recently, the 7th session of the traditional scientific event, "Mehedinti Medical Days", discussed the topic "Morbidity Factors with Increased Risk of Lethality". In the framework of this event, the Health Directorate of Mehedinti County and the collective organizing the session proposed the following as the theme of the discussion: "The Relationship between Diseases and Death". The subject was discussed in the light of the efforts which the health personnel are making to improve the state of health of the population and to improve the principal demographic indicators.

There was wide participation in the event, by teaching cadres from the Timisoara, Bucharest and Craiova university medical centers and a large number of specialists and medical cadres from health units in Mehedinti County. In the first report, there was a thorough analysis of the relationship between morbidity and general mortality as well as an evaluation of the influence of these indicators on the average life span.

The second report, presented by University Lecturer Dr. Eufimia Anghelescu (Timisoara Medical Institute) discussed a number of problems related to the acquired immune deficiency syndrome.

/9738

CSO: 5400/3010



CONTROVERSY SURROUNDS REPORTS ON TYPHOID OUTBREAK

Paper's Critique of Government

Castries THE WEEKEND VOICE in English 24 Jan 87 p 2

[Editorial]

[Text]

THE typhoid outbreak in parts of Dennery has become the latest issue for public political controversy in Saint Lucia, and one wonders whether we in this country can ever conduct our affairs without undue controversy.

Indeed, the issue has been so thoroughly politicised that responsible technical personnel in the Ministry of Health who the people of this country, and the media, have always relied on in the past for reliable and accurate information on health matters do not now want to talk about it.

During the week, for some strange reason, it was the politicians who the country had to depend on for public information about a health problem. Is this acceptable? We think not, especially given the nature of the problem and its potential for spin-off effects.

While we understand the desire of the political hierarchy in wanting to ensure that any typhoid outbreak here is not detrimental to the thriving tourist industry or any other area of economic activity in the country, we do not share the view that for this

reason alone anyone has the right to downplay the seriousness of the outbreak. What we need are the stark facts and nothing more.

Just before Christmas, Director of Medical Services Dr. Anthony d'Souza announced in an interview with the Caribbean News Agency that 22 cases of the illness had been identified. Earlier this month, the Minister of Health Mr. Clendon Mason put the figure at a maximum of 10. Readers can draw their own conclusions.

Since then there have been statements in the CRUSADER challenging the Minister's figure. The Prime Minister then saw it fit to join the fray by quoting a figure six times higher than the CRUSADER reported, and incorrectly attributing this inflated figure to the paper as well.

But there are other discrepancies too. The Minister, for instance, told the nation that the outbreak had been confined to a pocket in the Morne Panache area. Reports reaching us indicate that although the outbreak is now under control, people in other areas of Dennery were affected.

We were informed yesterday by reliable and authoritative sources in the Ministry of Health who, for fear of displeasing the politicians, wanted to remain unanimous, that things are pretty much under control in Dennery. The whole matter was under investigation by health personnel and there were intensive community and health education campaigns going on. At

least this information is most welcome.

But we must stress the importance of the people of this country being given accurate and truthful information at all times especially on crisis matters. In this case, it is pretty clear that the public has been told all it should know.

#### New Charges of Disease's Spread

Castries CRUSADER in English 31 Jan 87 p 1

[Text]

In the course of an HTS Press Conference on Thursday PLP Leader George Odium made the point that his revelation of the statistics of typhoid was meant to underscore the point that a Government has a duty to give accurate information to its people. He berated the Health Minister and the Prime Minister for their irresponsibility in using wild statistics and equally wild statements to hoodwink the people of St. Lucia.

"Even now" he said, the incidence of Typhoid cannot be said to be contained in one localised area of Morne Panache. Morne Panache only has one or two cases but the Minister would never admit that Grand Riviere alone has twenty-two cases of Typhoid and the Castries area has five cases of Typhoid." He added that "I will not even dwell on the number of Aids cases at St Jude's Hospital."

/9274

CSO: 5440/069

## MEDICAL EXPERTS WARN OF GOVERNMENT'S INACTION OVER AIDS THREAT

Health Department Accused of Withholding Funds

Cape Town CAPE TIMES in English 28 Feb 87 pp 1, 2

[Article by Chris Erasmus and Chris Steyn]

[Text]

**AN URGENT warning that the government was dragging its heels over the growing Aids threat was sounded yesterday by top doctors who claimed the authorities were withholding desperately needed funds to fight the disease.**

In a related development, Dr Marius Barnard, the PFP's health spokesman, called for all South Africans who have had more than one sexual partner in the past two years to be tested for the virus.

Experts also warned that the disease, which was spreading rapidly southwards through the frontline states, was posing a serious threat to South Africa.

And health authorities at South African airports have admitted that there is little they can do to prevent the entry of immigrants, travellers and businessmen who may have the disease or be carrying the virus.

The Director-General of the Department of National Health and Population Development, Dr Francois Retief, said that a press release on "the control strategy of Aids" will soon be made available.

But doctors who daily deal with a growing number of cases — 58 full-blown Aids cases are on record, about 600 people could have the milder Aids-related complex (ARC) and about 6 000 have been infected — accused the Department of Health of:

□ Failing to make available funds to set up clinics or units to treat Aids and ARC patients, to counsel victims, their families and partners, and — most important — to trace sexual contacts of all infected people;

□ Failing to launch a full public information campaign, similar to pamphlet, poster and booklet campaigns under way in Europe and the US.

Questioned on whether Aids clinics had been set up locally, Dr Frank Spracklen, of the National Aids Advisory Group, said such attempts had been made but funding was not forthcoming. The Medical Research Council had been approached for funds, but had turned down the application.

Professor Andries Brink, president of the MRC, said it was not its task to fund clinical Aids programmes, even if they generated research data.

But, he said, the setting up of such clinics was not only something that needed to be done urgently, but was "already overdue".

The tracing of sexual contacts of people infected with the Aids virus, regardless of whether or not they showed signs of disease,

was of critical importance in preventing the spread of the virus and limiting the numbers who would ultimately die.

"Funds have been made available for fundamental research, primarily by the National Institute of Virology, and it can be expected that this will generate practical results. But further funding for clinics and tracing of infected people has to come from the Department of Health," Prof Brink said.

Dr Barnard said South Africans were "too complacent" about the disease and an education programme was urgently needed as Aids was destined to reach epidemic proportions. People had to be told to use condoms to save lives.

"I hope this does not offend religious groups. I am not encouraging the use of condoms as a form of birth control but rather as a way in which lives can be saved."

In his reply to Cape Times questions, Dr Retief said: "We regret it is impossible to reply to your ... questions regarding Aids within the time specified. All issues raised are being handled by the Aids executive body whose formation was an-

nounced recently by Dr (Willie) van Niekerk."

Dr Ruben Sher, Aids researcher at the SA Institute of Medical Research, said the Central African Aids epidemic was spreading southwards and that medical authorities could only slow but not stop the infection reaching SA.

"When the crunch will come, I don't know, but come it will," he said.

South African airport officials have found themselves in the near impossible position of trying to prevent the importation of the Aids virus.

Because there is no vaccination for Aids, officials cannot demand standard health certificates from travellers from countries where infectious diseases are rife.

Although there is no specific "Aids alert" at South Africa's international airports, staff are on the constant look-out for people with "any untoward and inexplicable symptoms".

Passengers showing

these symptoms are immediately isolated and put into quarantine until the infection is identified. All other passengers who have been in contact receive notification and may also be tested.

But these precautions are virtually impossible to apply to Aids virus carriers who often show no symptoms.

Dr Spracklen said, however, that travellers should be asked for a certificate declaring they have been tested for Aids anti-bodies — although this did not guarantee that all infected people would be picked up.

#### Health Officer Calls For Action

Cape Town CAPE TIMES in English 19 Feb 87 p 3

[Article by Chris Erasmus and John Van Der Linden]

[Text]

CAPE TOWN'S Medical Officer of Health, Dr Reg Coogan, has endorsed calls by leading doctors for prompt action to slow the spread of Aids in South Africa.

Dr Coogan said yesterday that while the incidence of Aids virus infection in the city was still very low, it was essential that public education campaigns be instituted to reach senior school children and those at greatest risk of infection.

"We have to fully inform school children, who are the most receptive to health education, as well as those currently most susceptible — promiscuous male homosexuals — about the risks of Aids, its transmission and how to avoid it.

"We also need to encourage those individuals who insist in indulging in risky sexual practices to use condoms as a physical barrier to spreading the infection," he said.

Dr Coogan said that ideally it would make sense to conduct Aids virus antibody tests on all those arriving at the city's sexually transmitted disease clinics for treatment — but the problem was financing.

"Each blood test for antibodies to the Aids virus still costs about R5 or R6 and we don't have the money to cover routine testing of thousands of people.

"I have contacted the Department of Health on this issue and they have assured me that there is a high-level action group which is studying the Aids question and which will soon allocate funds where they are most needed — but one must remember they do

not have unlimited funds and it is a matter of priorities."

Meanwhile, Aids has yet to make itself felt as a serious threat among Cape Town's prostitutes and escort girls.

In the US, the rapid spread of the disease has severely curtailed their activities. Warnings are issued almost daily in the US and hundreds of brothels as well as escort agencies have reportedly closed in the face of the Aids danger.

Several Cape Town-based escort agencies approached this week by the Cape Times indicated the disease was still not being taken seriously by their employees.

A 23-year-old woman, who has been employed with an escort agency for the past three years, said she believed that most clients were "after more than just an escort ... (but) Aids is so remote that most of the girls don't really give it much thought".

A senior member of the Cape Town Vice Squad said he was not aware of any decline in prostitution due to the Aids threat.

"But when one takes into consideration the escalation of the disease in the US, and the resulting panic among prostitutes and contact sports players, it seems the dangers of Aids have not yet been clearly spelt out to the local population," he said.

/12828

CSO: 5400/122

FEAR OF AFRICAN AIDS STRAIN SPREAD BY TOURISTS

Cape Town THE ARGUS in English 19 Feb 87 p 5

[Text] THE Aids threat in South Africa is primarily from the African strain of the virus spreading rapidly south through the frontline states, say experts.

A virologist at the University of Cape Town involved in Aids research and surveillance said although there were no known cases of African Aids in South Africa, there was no way to stop people who were carriers or had the disease from entering the country.

The Government had accepted a "blueprint for action" by the National Aids Advisory Committee. He declined to comment on the recommendations.

It was very important to dispel the widely-held belief that heterosexuals who had only one sexual partner could get Aids, he said.

"A statement that one in two sexually-active people will be infected with Aids by the year 2000 is not true at all.

"Sexually promiscuous people are at risk, but the happily married, stable couple with no other sexual partners is not at risk at all."

Researchers in the department of virology at the University of Stellenbosch were working to isolate strains and towards finding a serum, he said.

Dr Frank Spracklen, also a member of the committee, agreed that nothing was being done to prevent infected visitors to the country from passing on the deadly virus.

/12828

CSO: 5400/122

AIDS DETECTION TESTS INTRODUCED IN PORT ELIZABETH

Port Elizabeth EVENING POST in English 27 Jan 87 p 8

[Article by Kin Bentley]

[Excerpts]

AIDS tests cost the Eastern Cape Blood Transfusion Service, which last week said it had identified one case of a person carrying the Aids virus in Port Elizabeth, nearly R10 a unit.

Dr Alexander Albert, medical director of the service, said the tests were introduced voluntarily by the service in September, 1985, when they first became available.

He said the positive Aids case, identified in the middle of last year, was the only case detected in 60 000 tests carried out in the region since then.

The person concerned does not have Aids, but is a carrier of Human Immunodeficiency Virus (HIV) antibodies.

Such people may — or may not — get Aids themselves, but can transmit the virus and the disease through sexual contact.

Dr Albert said all seven transfusion services in the country had launched publicity campaigns to discourage anyone who might be at risk from giving blood. They had also issued their own pamphlets on "safe sexual practices" — as had homosexual organisations.

People in the high-risk category were those who had had homosexual contact since 1979 and particularly those having repeated homosexual contacts.

He said the case of the Port Elizabeth victim had been reported to his doctor, who would have notified the health authorities.

Because blood transfusion is one way in which the virus can be transmitted, blood transfusion services

introduced the Aids test as soon as it was developed.

"No one can get Aids by donating blood," he stressed.

Dr Willie van Niekerk, the Minister of Health and Population Development, said recently that 41 cases of Aids had been diagnosed in South Africa in the past five years. Of these, 28 of the victims had died.

"Although a relatively small number of cases have been diagnosed so far in SA, the disease certainly has the potential to become a major problem," Dr Van Niekerk said.

/12828

CSO: 5400/98

## BRIEFS

RISE IN MEASLES DEATHS AMONG CHILDREN--Babies were dying at the rate of two a month at Cape Town's Red Cross Memorial Children's Hospital in a large increase in measles cases. The head of the Child Health Unit at the hospital, Prof Maurice Kibel, said the number of measles admissions at the hospital had trebled since 1984. Babies under nine months were badly hit by the disease. Overcrowded living conditions, a high percentage of unvaccinated children and a vast pool of infection in the community were some factors accounting for the rampant increase in measles, he said.  
[Text][Johannesburg THE STAR in English 29 Jan 87 p 4]/12828

TWO MORE AIDS VICTIMS IN JOHANNESBURG--AIDS has claimed another two South African victims, both in Johannesburg, one of whom has died. And an estimated 6000 South Africans have so far been infected by the virus which causes the deadly disease, according to Dr Frank Spracklen, a member of the National Aids Advisory Group. The two new cases follow the seventh Aids death in Cape Town nine days ago. There are now four Cape Town Aids sufferers. To date there have been 58 recorded cases of Aids in South Africa, with 35 deaths, Dr Spracklen said. As part of the national strategy to combat the disease, Dr Spracklen is giving lectures to Cape Town schoolchildren in Stds 9 and 10 about the risks of Aids. "We have been telling schoolchildren who are of an age when they may have become sexually active all about the disease, the risks involved and methods of preventing its spread. "For instance, it may be considered strongly advisable that condoms be made available to sexually active teenagers," he said. Meanwhile, it has been confirmed that police officers at every station in the country have received instructions on how to avoid being infected with the Aids virus, following the exposure recently of six emergency workers and two Groote Schuur Hospital staff members to the body fluids of an Aids virus carrier. Colonel Vic Heyns, of the Police Public Relations Directorate in Pretoria, yesterday said a circular containing new instructions regarding the handling of bodies has been sent to police stations countrywide. [Text][Cape Town CAPE TIMES in English 17 Feb 87 p 1]  
[Article by Chris Erasmus and Chris Steyn]/12828

CSO: 5400/122



AIDS, LEPTOSPIROSIS, HEPATITIS-B DESIGNATED EPIDEMIC DISEASE

Seoul THE KOREA HERALD in English 24 Feb 87 p 1

[Text]

The Ministry of Health and Social Affairs yesterday decided to apply a law governing anti-infectious diseases to AIDS, leptospirosis and chronic hepatitis-B in a bid to effectively curb the spreading of such diseases.

A ministry spokesman said the move is designed to prepare a legal basis to forcibly diagnose or isolate virus carriers and patients of the three diseases.

The ministry action came in the wake of a recent death of an AIDS virus carrier who returned home late last month from Kenya.

In addition, leptospirosis has continuously stricken many farmers and other rural residents, claiming more than 26 deaths and some 7 percent of the total population are now infected with hepatitis-B.

As the three diseases will be treated as legally designated major infectious diseases, medical doctors who diagnose virus carriers and patients of AIDS, leptospirosis will be obliged to immediately report them to directors of state-run health centers who will

again report them to city majors and country chiefs.

Medical doctors who diagnose patients of chronic hepatitis-B should report the patients to directors of health centers once a month.

Those who receive reports from medical doctors are under obligation to take appropriate measures, including epidemiology surveys.

The law stipulates that regulation violators will face fines of up to 500,000 won.

Under the law, virus carriers and patients of such diseases are restricted from gaining employment at restaurants, entertainment establishments and other service fields.

The new measure cleared the way for the Health Ministry to forcibly diagnose or quarantine both virus carriers or patients of the three diseases and suspected ones, the spokesman said.

When any vaccine is developed for the diseases, the ministry will provide free vaccination to people, he said.

/12828

CSO: 4100/138

HEALTH-SOCIAL AFFAIRS MINISTRY REQUIRES REPORTING OF AIDS

Seoul THE KOREA TIMES in English 24 Feb 87 p 3

[Text]

The Health-Social Affairs Ministry designated the acquired immuno-deficiency syndrome (AIDS) as a disease requiring report along with leptospirosis and B-type hepatitis yesterday, providing a legal basis to take necessary preventive measures in a fight against the dreadful diseases.

The Ministry fears AIDS, described as STD (sexually-transmitted disease), is likely to occur in the country, and is stepping up measures against its possible outbreak and spread.

Following the order, all medical doctors, including Oriental medicine doctors, are required to report patients or suspected patients of the disease to health authorities immediately they discover them.

As AIDS is now included in the "reportable" disease category, the health authorities are authorized to force suspected sufferers to undergo medical check-ups if deemed necessary.

City and provincial administrations and chiefs of public health centers across the country are to draw up a list of patients after conducting epidemiological surveys and other necessary measures upon getting reports.

The ministry's designation of AIDS in the "reportable" disease category is designed to detect virus carriers or sufferers at an early stage of the disease to prevent them from spreading it to others.

In line with the ministry measure, AIDS patients are to undergo treatment at home, being separated from others. They are also banned from getting jobs requiring contacts with the general public.

According to the Epidemic Prevention Law, those who fail to comply in reporting or refuse to receive medical check-ups will be fined a maximum 500,000 won.

In cases of B-type hepatitis, medical doctors are required to report discovery of sufferers once every month. The health authorities aims at lowering B-type hepatitis' infection rate to one percent of the entire people, the same as the level in advanced countries. It presently stands at around seven percent.

FOREIGNERS MAY BE REQUIRED TO PRESENT AIDS-FREE PROOF

Seoul THE KOREA TIMES in English 26 Feb 87 p 3

[Text]     Foreigners coming to the country for employment or other purposes are likely to be requested to carry AIDS-free certificates with them if they intend to stay here for a long time.

Faced with growing concern about a possible outbreak of the disease, the Health-Social Affairs Ministry is seriously considering putting the measure in effect, possibly this year, as a precautionary action.

A ranking official of the ministry, who wanted to remain anonymous, said yesterday, "we have every reason to demand it from foreigners, especially those who come from hard-hit regions of AIDS."

He said, "Korea still remains a safe area in terms of the disease. Preventive measures against AIDS cannot be taken too early. Korea should take all the necessary measures to protect itself, following the example of other countries.

Saudi Arabia and other Middle East nations have demanded foreigners seeking jobs there to carry certificates showing that they are free of infection from the AIDS virus.

In Korea, there are only three people who showed a positive reaction in tests for AIDS. A 62-year-old man, a suspected AIDS-virus carrier, died recently after returning to the country from Kenya.

Alarmed by the man's death caused by ARC (AIDS-related complexes), the health authorities have stepped up anti-AIDS measures, placing priority on blocking the infiltration of the deadly disease.

The ministry official said, however, that demand of AIDS-free certificates from foreigners will be finally set only after close consultation with other government offices, including the Foreign-Affairs Ministry.

He emphasized that with no cure or vaccine available in the near future, there is no other alternative but to take actions to prevent foreign virus-carriers from coming and spreading it in the country.

In reference to U.S. forces stationed in the country, he said that there is hardly a chance for them to pose threats because all of them have to undergo tests for AIDS before being dispatched here.

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CSO: 4100/138

SRI LANKA

RETURNING TAMILS SPREADING CHOLERA

BK060452 Hong Kong AFP in English 0442 GMT 6 Feb 87

[Excerpt] Colombo, 6 Feb (AFP)--Tamil refugees are returning to Sri Lanka with cholera, forcing health authorities to take urgent steps to treat the victims and prevent the disease from spreading, officials have said.

Government Rehabilitation Secretary Austin Fernando said medical supplies had been airlifted to the northwestern city of Mannar, where many refugees returning from the Indian state of Tamil Nadu have suffered from cholera and other illnesses such as scabies and diarrhea.

Cholera had previously been eradicated from Sri Lanka, where Tamil separatists have been fighting a guerrilla campaign against government forces since July 1983.

In an interview, Mr Fernando said authorities in Mannar were taking stringent measures to prevent cholera and other diseases from spreading to other parts of this small island nation.

He said there were a growing number of Tamils returning to their former homes from India.

"We spend nearly 10,000 rupees (400 dollars) to resettle each family in their former homes," Mr Fernando said.

"The state gives an average family two months of dry rations and assistance to buy even home utensils, as well as money to start a small agricultural activity," he said.

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CSO: 5400/4708

## BRIEFS

ANTIMALARIA CAMPAIGN DIRECTOR ON EPIDEMIC--Sri Lanka is the throes of an acute epidemic of malaria, which could lead to grave economic consequences unless it's spread is promptly arrested. So said Dr. Lionel Samarasinghe, Director Anti-Malaria Campaign at a seminar held for media personnel at the Family Health Bureau yesterday. The disease is particularly vicious in the entire dry zone but number of cases have been found in Maharagama, Kaduwela, Ja-ela, Kandy, Katugastota, Kegalle and several other places. In 1986 1,469,737 blood films were examined and 82,689 positive Falciparum cases detected. Among them were 4,191 infant positive cases. This is a four fold increase compared to 1,028 in 1985. Similarly, the number of P. Falciparum cases had shown a seven fold increase in 1986 when compared to 1985, Dr. Samarasinghe said. About 5,000 positive cases of P. Falciparum were recorded every month. The position was made worse by the lack of proper houses for new arrivals in settlements and a steep increase in the vector density of the vector population following the construction of irrigation channels. He said the likelihood of internal transmission of malaria in the city of Colombo and in the suburbs was carefully monitored with entomological investigations being conducted regularly. "We are therefore witnessing the real state of malaria today. Owing to the ready availability of the anti-malarial drugs, no malaria deaths have been reported", Dr. Samarasinghe said. [Text][Colombo THE ISLAND in English 24 Feb 87 p 1]/12828

CSO: 5400/4709

# 106 OF 149 REPORTED CASES OF AIDS PROVE FATAL SO FAR

Port-of-Spain SUNDAY EXPRESS in English 22 Feb 87 p 3

[Text]

THERE have been 149 cases of AIDS resulting in the death of 106 persons in this country, according to statistics gathered up to the end of January. These up-to-date figures were disclosed by Dr Bisram Mahabir, director of the Caribbean Medical Centre, at a seminar organised by the San Fernando Lions Club Friday night at Lions Civic Centre.

Lion's president Justin Paul and health committee chairman Dr Joseph Razack explained that the seminar was intended to raise the awareness of young people to sexually transmitted diseases before Carnival.

Dr Mahabir said the high risk groups in this country were homosexuals, from which had come about 75 per cent of the cases; 12 per cent of the cases involved women, who had been infected with the AIDS virus by bisexual men and 10 per cent were infants to whom the virus was transmitted from their mothers, who had contracted the disease. Dr Mahabir said the cases of infants being affected by infected mothers were now a new dimension of the problem. According to Dr Mahabir, AIDS in this country rose from eight in 1983 to 149 cases at the end of January, 1987.

The medical doctor said the use of condoms would offer the best protection against contracting the disease since the virus would not be able to penetrate the latex of the condom sheaths.

The AIDS virus, he stressed, could not be contracted through the use of towels or other items used by carriers of the disease, but only by direct sexual contact with a carrier.

Dr Mahabir also pointed to an increase in the number of cases of gonorrhea and syphilis, over the past year. He said these were still, "common problems here and throughout the world." He noted a decline over an 8-10 year period, but during the last two years — 1985-86 — there was a reversal in that trend. He said: "Gonorrhea and syphilis are rising again in our country." According to statistics released by Dr Mahabir there were 4,300 cases of gonorrhea recorded in 1986 and more than 3,000 cases of syphilis. The counties of St George and Caroni were regarded as high risk areas.

Another sexually transmitted disease on the rise in this country is genital herpes for which there is yet no cure. In 1980 only 14 cases were reported with a peak of 168 cases in 1982. There was a decline of herpes in 1983 and 1984, but a significant increase was reported in 1985-86.

Dr Mahabir said research carried out had confirmed a rise in venereal diseases coming directly after Carnival. He pointed out it was the responsibility of all persons to protect themselves and unborn generations from these diseases. The high risk age groups were 20-24; 25-29 and 30-34 years.

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CSO: 5440/070

## MEASLES DEATHS IN KABAROLE

Kampala THE WEEKLY TOPIC in English 21 Jan 87 pp 1, 12

[Excerpts]

**A MEASLES epidemic has broken out in Kicheche county in the extreme south of Kabarole district. Almost every family in the area is reported to have lost a child in the measles-inferno.**

The residents from the county, commonly known as Kitagwenda, have said that in some extreme cases, some families have lost three children and very unfortunate ones buried as many as four. A number of school-going children were also reported to have died of measles.

The disease outbreak, which according to the residents, has reached epidemic proportions, broke out in November of last year. Immediately, the reports say, deaths as a result of measles attacks became very frequent.

*Weekly Topic* however, learned from the very residents that immunization programme against the measles in the area had been on since 1983.

The residents, therefore, offered two explanations that could have led the measles attacks to reach an epidemic level and claim the lives of so many children. They said that it was possible the vaccine could have been improperly stored. Others were of the view that some parents had not responded enthusiastically

towards vaccination campaigns.

Most deaths are believed to have occurred in the post-measles period also. Some parents appeared to have been too busy attending to these in critical conditions, others did not know simple home health techniques to handle the situation. For instance, the residents explained, diarrhoea, which usually accompanies measles attacks, was the major cause of deaths.

The residents confessed that very few of them had been exposed to the knowledge about the significance of oral rehydration therapy and how to administer it. Most of the measles victims are believed to die of dehydration.

Even though sources in Kicheche said that immunization services have been available since 1983, they did not deny that the whole of the period in 1970s passed without a single child being vaccinated against preventable diseases like measles, tetanus, tuberculosis, diphtheria, whooping cough or polio.

The problem though seems to worsen by the incredible distance from the district headquarters, in Fort Portal, to Kitagwenda. The feeder roads are also almost impassable and public transport is also nearly non-existent.

/9317

CSO: 5400/120

## BRIEFS

CHOLERA STRIKES NDEEBA--Sixteen people have died of cholera in Kabowa-Ndeebe, near Kampala between December 24, 1987 to date. Another 49 people in the area are reportedly suffering from ailments ranging between vomiting, fever, lullalama (stiff neck), diarrhoea, headache and typhoid. No other area in Kampala has been reported to be struck from epidemic yet, but authorities are waiting for reports from other areas. A report on the health situation in the area says the epidemic broke out on December 24 last year with the death of a six-month baby Nsubuga. More cases were later reported and the resistance committees notified the administrative hierarchy. By the time the report was received by the Town Clerk on January 8, 1987, 12 people had been feared dead from the disease. [Excerpt] [Kampala NEW VISION in English 13 Feb 87 p 12] /9317

TYPHUS HITS KABALE--A fever suspected to be of the typhus type has reached epidemic proportions in parts of Maziba and Bukinda sub-counties in Kabale district. This kind of fever has hit Kabale in recent past. Women appear to be more susceptible to this disease than men. Over the Christmas period, over 70 percent of the victims were women. Bukinda dispensary was already filled to capacity with such cases. Some women had to occupy parts of the male ward. On Wednesday, a traveler from the area told The New Vision that the disease had reached an alarming proportion. Last week a mother was buried along with her baby, both had suffered from the fever and died. The population in the affected areas has appealed to Ministry of Health authorities to do something before the situation gets out of hand. [Excerpts] [Kampala NEW VISION in English 9 Jan 87 p 3] /9317

CSO: 5400/120



## BRIEFS

AIDS RELATED DEATHS--The minister of health, Comrade Sydney Sekeramayi, has disclosed there have been further AIDS related deaths in Zimbabwe. Speaking on the ZTV [Zimbabwe Television] program, the Nation, last night, Comrade Sekeramayi said the blood transfusion service has been instructed to report any diagnosed case of the killer disease to the ministry. He said the government has nothing to hide about the incidents that are in Zimbabwe. He added that the ministry is to embark on a massive education campaign to inform the public about the disease. The minister said a cure for AIDS has yet to be found, and if the clinical price of medicine recommended by France and the U.S. prove effective, then Zimbabwe will import them. [Excerpt] [Harare Domestic Service in English 0500 GMT 2 Mar 87 MB] /8309

CSO: 5400/117

## CATTLE DISEASE EPIDEMIC IN SEVERAL AREAS

Dhaka THE BANGLADESH OBSERVER in English 13 Feb 87 p 7

[Text]

MAULVIBAZAR, Feb.11—  
Cattle disease broke out in an epidemic form in different upazilas of Maulvibazar district. At least 500 cattleheads died of the disease and several hundreds have been attacked.

Preventive and curative measures taken up by the Animal Husbandry Department are quite inadequate. Scarcity of medicines and shortage of field staff and Veterinary surgeon has aggravated the situation.

According to an official of District Animal Husbandry office all the upazila offices of the district are running short of staff. There are only 12 field assistants for 66 unions of six upazilas of the district and there are no veterinary assistant surgeon in any of the upazilas excepting sadar upazila.

He also added that supply of medicines is not sufficient to arrest the situation. This office could not give any death report of the cattleheads as they have no death register. However he confirmed the report of death of cattleheads. Measures are taken up with available resources, he said.

It may be mentioned here that boro crop cultivation within the Monu River project area under Maulvibazar and Rajnagar upazila will not be successful due to loss of cattle heads.

An official entrusted with the project told me that due to cattle disease 50 per cent of land within the project area could not be cultivated.

This year a total of 13500 acres of land have been taken up for boro cultivation within the Monu River project area but till now only 4,000 acres of land have been brought under cultivation.

BRIEFS

NABIGANJ CATTLE DEATHS--Shylhet, 22 Jan--Cattle disease broke out in an epidemic form in Nabiganj Upazila. About 500 cattlehead died of the disease and several hundreds have been attacked. [Text] [Dhaka THE BANGLADESH OBSERVER in English 24 Jan 87 p 7] /9274

JAMALPUR CATTLE DEATHS--Jamalpur, 29 Dec--At least 150 head of cattle died of cattle disease in Jamalpur district during last two months. It is learnt that the disease has broken out in seven upazilas of the district. No effective measures are being taken to curb the disease, it is alleged. [Text] [Dhaka THE NATION in English 31 Dec 86 p 2] /9274

MORE CATTLE DISEASE--A cattle disease who broke out in an epidemic form in Gowainghat upazila has claimed 50 cattlehead during the last fortnight. The most affected area are Fatehpur and Aligaon union where more than 100 cattlehead are suffering. The upazila Animal Husbandry has no drugs to fight the disease. [Text] [Dhaka THE BANGLADESH OBSERVER in English 14 Feb 87 p 7] /13104

INFECTED PYEDOGS--Pye-dogs which were suffering from various diseases including syphilis have been creating health hazards to the people of Ishurdi pourashava and all over the upazila. The number of dog-bites is increasingly in pourashava area. It is learnt that there are about 1000 pye-dogs in the town. Dogs move around the hotels, restaurants, near shops and railway yard. [Text] [Dhaka THE BANGLADESH OBSERVER in English 12 Feb 87 p 7] /13104

CSO: 5450/0101

## BRIEFS

BOVINE ANTHRAX IN TAMALE--There is an outbreak of anthrax in Tamale and surrounding areas according to Dr Thomas Addai, West Dagomba District Veterinary Officer. He explained that the situation has become serious since the disease, which affects cattle, sheep and goats has already been reported in Sakasaka, Ghoggu-Kukuni Vitim, Dohinayili, Jakapayili and Gumbihini. Dr Addai advised the public to buy meat from the Aboabo Meat Shop at Tamale where there were always veterinary officers to supervise the sale. He said the Veterinary Department would require 250,000 doses of vaccines for all the animals within the affected areas, adding that no animal would be allowed to move in or out of the area during the period of vaccination. Dr Addai further explained that no animal would also be allowed to be slaughtered during the three-week period that the vaccination would last. Human beings who contract the disease by eating the meat of the infected animal die within 48 hours, Dr Addai added.--GNA [Text]  
[Accra GHANAIAN TIMES in English 18 Feb 87 p 1] /9317

CSO: 5400/121

## RABID JACKAL ATTACK SPARKS COMPULSORY RABIES INOCULATIONS

### Sites of Free Inoculations Announced

Cape Town THE ARGUS in English 29 Jan 87 p 2

[Text]

KRAAIFONTEIN residents have been urged to bring in their pets for compulsory free rabies inoculations.

The State Veterinarian, Dr R Visser, said all pets within a radius of 16km of Lekkerwater farm in Muldersvlei must be inoculated.

A rabid jackal, which attacked a dog, was shot by the owner of the farm, Dr Philip Loftus. The jackal's brain was sent to Onderstepoort for rabies tests, which proved positive.

Dr Visser emphasised that all pet-owners should have their pets inoculated to insure that they did not become a danger to other animals and to humans. Rabies was a certifiable

disease which meant that anybody who did not have dogs and cats inoculated could be prosecuted.

Kraaifontein residents can take their dogs and cats to the following venues on Tuesday (between 8.15am and 3.30pm): La Pleasant farm, Zoo Road, or Lushof farm, Old Paarl Road, Kraaifontein; auction hall, Elsenburg Agricultural College.

On Thursday (8.15am to 3.30pm) animals will be inoculated at: BKB Auction sites, Klapmuts; County Fair, Pheasantkop farm.

Dr Visser said inoculations would be continued during the following week. Venues would be announced.

### 'Last Chance' for 3,000 Dogs

Cape Town THE ARGUS in English 17 Feb 87 p 3

[Text] Tygerberg Bureau

ABOUT 3 000 dogs in Kraaifontein are posing a danger to public health because they have not been inoculated against rabies, State veterinarian Dr R Visser said today.

He warned that rabies inoculations were compulsory in the Kraaifontein and Muldersvlei areas and he was giving Kraaifontein pet owners a last chance to have their pets inoculated free of charge at the clinic in Berth Street, opposite Bloch's shopping centre, from 8am to 1pm on Saturday.

All dogs and cats three months and older that had not had rabies injections had to be brought in, he said.

The inoculation campaign was launched after a jackal, shot when it attacked a dog on Lekkerwater farm in the Muldersvlei area, was found to have rabies.

Dr Visser said all dogs and cats within a 16km radius of Lekkerwater, which includes Kraaifontein and Muldersvlei, had to be inoculated.

The municipality estimated that there were at least 3 000 dogs that had not been inoculated.

/12828  
CSO: 5400/98

END